



United States

ENVIRONMENTAL PROTECTION AGENCY

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.

OMB Control No. 2070-0020

Expires on 11/30/2016

Part 1: To Be Completed by Importer of record or Licensed Customs Broker**1. Name and Complete Address of Licenced Customs Broker**CH Robinson Freight Services Ltd
900 Town & Country Lane, Ste 310
Houston, TX 77024 (28937)**2. Name and Complete Address of Importer of Record**Vision Fluorochem USA Inc.
5636 Belton Lane
McKinney, TX 75070☒ Return Form to this Address☐ Return to this Address**3. Name and Complete Address of Shipper**Vision Fluorochem (Nanjing) Ltd
150 Puqiao Rd., Nanjing Chemical Industry Park
Nanjing China 210047**4. EPA Registration Number**

35935-92

5. EPA Producer Establishment No.

090414-CHN-001

6. Brand Name of Product

Fludioxonil Technical

7. Active Ingredients and Percentage of Each

Fludioxonil 99%

8. Unit Size

25 kg drums

9. Quantity

6 drums

10. Total Net Weight

150 kgs

11. Country of Origin

China

12. Port of Entry

Chicago, IL 3901

13. Name and Complete Address of CarrierAWB 999-26299173
Air China Ltd,
10000W. O'Hare Ave
Chicago, IL 60666**14. Entry Number**

279-1891343-8

15. Anticipated Entry Date

March 28, 2015

17. Location of Goods for Examination after ImportationNufarm Americas
11901 South Austin Ave.
Alsip IL 60803
or Channel Distribution, 925 W. Thorndale Ave. Itasca, IL 60143**16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment—see instructions.)****18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)**☐ 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____☐ 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____☐ 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____

EPA Registration Number: 35935-92	Product Name: Fludioxonil Technical
Total Net Weight: 150 kgs	Entry Number: 279-1891343-8

☐ 18d. A Pesticide distributed for research and development purposes without an Experimental Use Permit.

☐ 18e. A pesticide transferred solely for export. Domestic Producer Establishment Number: _____

☐ 18f. A pesticide distributed under an emergency exemption. Emergency Exemption Number: _____

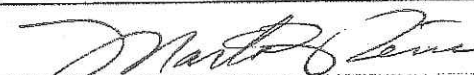
☐ 18g. A pesticide transferred for the purposes of disposal.

☐ 18h. Other. Provide an explanation including the intended use and a description of why the product is being imported into the United States in Block 19 -- Remarks.

19. Remarks. Provide additional information here. It is recommended that a copy of the label affixed to the product be submitted with the NOA.

Certification

I certify that the statements I made on this form and all attachments thereto are true, accurate and complete. I acknowledge that any knowingly false or misleading statement may be punishable by fine or imprisonment or both under applicable law.

20. Printed Name of Importer of Record or Licensed Customs Broker	CH Robinson Frt Svcs Ltd, Marta Pena	Telephone No.: 281-313-6000 X6647
21. Signature of Importer of Record or Licensed Customs Broker:		Date: April 10, 2015

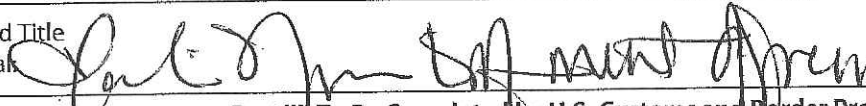
Part II: To Be Completed by U.S. Environmental Protection Agency

Action to be taken by U.S. Customs and Border Protection:

☐ Release Shipment ☒ Detain for inspection ☐ Release shipment to consignee under bond. Shipment must be held intact pending inspection.

☐ Other. (Specify) **ENFORCEMENT HOLD - EPA INSPECTION**

Remarks: **19 APR 12 113 - THIS IMPORT SHIPMENT SHOULD BE MOVED TO A CENTRAL EXAMINATION SITE FOR INSPECTION. PLEASE CONTACT EPA AT 312-886-7598 OR 312-886-6009 WHEN SHIPMENT IS AVAILABLE**

Signature and Title of EPA Official		Date: 4/16/15
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Part III: To Be Completed by U.S. Customs and Border Protection

The information shown in Part I was compared with the entry papers for this shipment and no discrepancies were noted. The shipment was handled as instructed by EPA in Part II. Any deviations should be brought to the attention of EPA before releasing the shipment and should be noted in "Remarks."

Remarks:

Signature of District Director of Customs:

Date:

Paperwork Reduction Act Notice: The estimated average time to read the instructions and complete this form is 26 minutes. Send comments regarding the burden estimates or any other aspect of this collection of information to: Director, Collection Strategies Division, Office of Environmental Information (OEI), U.S. Environmental Protection Agency (Mail Code 2822), 1200 Pennsylvania Avenue, NW, Washington, DC 20460. Include OMB number 2070-0020 in any correspondence.



United States
ENVIRONMENTAL PROTECTION AGENCY

OMB Control No. 2070-0020
Expires on 11/30/2016

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.

Part 1: To Be Completed by Importer of record or Licensed Customs Broker

1. Name and Complete Address of Licenced Customs Broker		2. Name and Complete Address of Importer of Record	
Expeditors International Attn: Brynn Wisz 849 Thomas Drive Bensenville, IL 60106 T:630-616-2318		Nufarm Americas Inc. 11901 South Austin Avenue Alsip, IL 60803 T: 708-377-1330	
<input checked="" type="checkbox"/> Return Form to this Address		<input type="checkbox"/> Return to this Address	
3. Name and Complete Address of Shipper		4. EPA Registration Number	5. EPA Producer Establishment No.
Nutrichem Co., LTD Building D-1, No. 66 Xixiaokou Road Haidian District, Beijing 100192, P.R. China 110108777062155		35935-92	88106-CHN-001
		6. Brand Name of Product	
		Fludioxonil Technical	
7. Active Ingredients and Percentage of Each			
Fludioxonil 99.0%			
8. Unit Size	9. Quantity	10. Total Net Weight	11. Country of Origin
25 Kg Cartons	10	250 Kg	China
12. Port of Entry		13. Name and Complete Address of Carrier	
Chicago Illinois		AIR BRIDGECARGO AIRLINES ON BOARD: RU622 AIR WAYBILL NUMBER 580-07014556	
14. Entry Number	15. Anticipated Entry Date		
231-0232145-7	April 27, 2015		
17. Location of Goods for Examination after Importation		16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment--see instructions.)	
Nufarm Americas, Inc. 11901 S Austin Ave Alsip, IL 60803 Phone: 708-377-1388			
18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)			
<input type="checkbox"/> 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____			
<input type="checkbox"/> 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____			
<input type="checkbox"/> 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____			

EPA Registration Number: 35935-92	Product Name: Fludioxonil Technical
Total Net Weight: 250 Kg	Entry Number: 231-0232145-7

- ☐ 18d. A Pesticide distributed for research and development purposes without an Experimental Use Permit.
- ☐ 18e. A pesticide transferred solely for export. Domestic Producer Establishment Number: _____
- ☐ 18f. A pesticide distributed under an emergency exemption. Emergency Exemption Number: _____
- ☐ 18g. A pesticide transferred for the purposes of disposal.
- ☐ 18h. Other. Provide an explanation including the intended use and a description of why the product is being imported into the United States in Block 19 -- Remarks.

19. Remarks. Provide additional information here. It is recommended that a copy of the label affixed to the product be submitted with the NOA.

AIR WAYBILL NUMBER 580-07014556

Certification

I certify that the statements I made on this form and all attachments thereto are true, accurate and complete. I acknowledge that any knowingly false or misleading statement may be punishable by fine or imprisonment or both under applicable law.

20. Printed Name of Importer of Record or Licensed Customs Broker	Vic Sweetwood	Telephone No.:	708-377-1365
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21. Signature of Importer of Record or Licensed Customs Broker:		Date:	April 24, 2015
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Part II: To Be Completed by U.S. Environmental Protection Agency

Action to be taken by U.S. Customs and Border Protection:

- ☒ Release Shipment ☐ Detain for inspection ☐ Release shipment to consignee under bond. Shipment must be held intact pending inspection.
- ☐ Other. (Specify)

Remarks:

Signature and Title of EPA Official:		Date:	4/27/15
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Part III: To Be Completed by U.S. Customs and Border Protection

The information shown in Part I was compared with the entry papers for this shipment and no discrepancies were noted. The shipment was handled as instructed by EPA in Part II. Any deviations should be brought to the attention of EPA before releasing the shipment and should be noted in "Remarks."

Remarks:

Signature of District Director of Customs:	Date:
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Paperwork Reduction Act Notice: The estimated average time to read the instructions and complete this form is 26 minutes. Send comments regarding the burden estimates or any other aspect of this collection of information to: Director, Collection Strategies Division, Office of Environmental Information (OEI), U.S. Environmental Protection Agency (Mail Code 2822), 1200 Pennsylvania Avenue, NW, Washington, DC 20460. Include OMB number 2070-0020 in any correspondence.

FLUDIOXONIL TECHNICAL

For Manufacturing Use Only

ACTIVE INGREDIENT:

Fludioxonil..... 99.0%

OTHER INGREDIENTS:..... 1.0%

TOTAL:..... 100.0%

EPA REG. NO. 35935-92

EPA EST. NO.88106-CHN-001

KEEP OUT OF REACH OF CHILDREN

CAUTION

SEE BELOW FOR FIRST AID AND ADDITIONAL PRECAUTIONARY STATEMENTS

For Chemical Spill, Leak, Fire, or Exposure, Call CHEMTREC (800) 424-9300
For Medical Emergencies Only, Call (877) 325-1840

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION

Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

FIRST AID	
IF IN EYES	<ul style="list-style-type: none">Hold eye open and rinse slowly and gently with water for 15 to 20 minutes.Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.Call a poison control center or doctor for treatment advice.
IF ON SKIN OR CLOTHING	<ul style="list-style-type: none">Take off contaminated clothing.Rinse skin immediately with plenty of water for 15 to 20 minutes.Call a poison control center or doctor for treatment advice.
IF INHALED	<ul style="list-style-type: none">Move person to fresh air.If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible.Call a poison control center or doctor for further treatment advice.
IF SWALLOWED	<ul style="list-style-type: none">Call a poison control center or doctor immediately for treatment advice.Have person sip a glass of water if able to swallow.Do not induce vomiting unless told to do so by the poison control center or doctor.Do not give anything by mouth to an unconscious person.
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.	

ENVIRONMENTAL HAZARDS

This product is toxic to fish and aquatic invertebrates. Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

This product is intended for the formulation of fungicide products. This product may be used to formulate products for specific use(s) not listed on the MP label if the formulator, user group, or grower has complied with the U.S. EPA data submission requirements regarding the support of such use(s).

FOR MANUFACTURING USE ONLY INTO A FUNGICIDE FOR THE FOLLOWING USES:

1. Seed Treatment Uses: Root and Tuber vegetables, Bulb vegetables, Leafy vegetables, except Brassica vegetables, Brassica (Cole) leafy vegetables, Legume vegetables (succulent or dried), Fruiting vegetables (except cucurbits), Cucurbit vegetables, Cereal grains, Nongrass animal feeds (forage, fodder, straw, and hay), Herbs and Spices, Rape, Cotton, Peanut, Crambe, Flax, Jojoba, Lesquerella, Safflower, and Sunflower.
2. Post Harvest Uses: Citrus fruit group (Crop group 10), Kiwi, Pome fruit group (Crop group 11), Pomegranate, Stone fruit group (Crop group 12), and Sweet potato.
3. Uses for which the US EPA has accepted the required data and/or citations of data that the formulator has submitted in support of registration; and
4. Uses for experimental purposes that are in compliance with US EPA requirements

STORAGE AND DISPOSAL

DO NOT contaminate water, food, or feed by storage or disposal.

PESTICIDE STORAGE: Always use original container to store pesticides in a cool, dry secured warehouse or storage building. DO NOT store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER DISPOSAL:

Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

WARRANTY DISCLAIMER AND LIMITATION OF LIABILITY

The directions for use of this product must be followed carefully. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, (1) THE GOODS DELIVERED TO YOU ARE FURNISHED "AS IS" BY MANUFACTURER OR SELLER AND (2) MANUFACTURER AND SELLER MAKE NO WARRANTIES, GUARANTEES, OR REPRESENTATIONS OF ANY KIND TO BUYER OR USER, EITHER EXPRESS OR IMPLIED, OR BY USAGE OF TRADE, STATUTORY OR OTHERWISE, WITH REGARD TO THE PRODUCT SOLD, INCLUDING, BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, USE, OR ELIGIBILITY OF THE PRODUCT FOR ANY PARTICULAR TRADE USAGE. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, BUYER'S OR USER'S EXCLUSIVE REMEDY, AND MANUFACTURER'S OR SELLER'S TOTAL LIABILITY SHALL BE FOR DAMAGES NOT EXCEEDING THE COST OF THE PRODUCT.

If you do not agree with or do not accept any of directions for use, the warranty disclaimers, or limitations on liability, do not use the product, and return it unopened to the Seller, and the purchase price will be refunded.

(RV030714)

17103000

NET WEIGHT: 1 X 55 LBS (1 x 25 KG)

Manufactured For
NUFARM LTD.
4020 Aerial Center Parkway
Morrisville, NC 27560



**1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**

Product Name: Fludioxonil Technical
EPA Reg. No.: 35935-92
Product Type: Fungicide - For Manufacturing Use Only
Company Name: Nufarm Limited.
4020 Aerial Center Parkway
Morrisville, NC 27560
1-800-345-3330

Telephone Numbers: For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident,
Call CHEMTREC Day or Night: 1-800-424-9300
For Medical Emergencies Only, Call 1-877-325-1840

This product is an EPA FIFRA registered pesticide. Some classifications on this SDS are not the same as on the FIFRA label. Certain sections are superseded by federal law governed by EPA for a registered pesticide. Please see Section 15. REGULATORY INFORMATION for explanation.

2. HAZARDS IDENTIFICATION**HEALTH HAZARDS:**

Acute toxicity, inhalation Category 4
Specific target organ toxicity – Repeated exposure Category 2

ENVIRONMENTAL HAZARDS:

Hazardous to aquatic environment, acute Category 1
Hazardous to aquatic environment, chronic Category 1

SIGNAL WORD:

WARNING

HAZARD STATEMENTS:

Harmful if inhaled. May cause damage to organs (liver, kidney) through prolonged or repeated exposure. Very toxic to aquatic life with long lasting effects.

**PRECAUTIONARY STATEMENTS**

Do not breathe dust, fumes, gas, mist, vapors or spray. Use only outdoors or in a well-ventilated area. Call a poison control center or doctor if you feel unwell. If exposed or concerned: Call a poison center/doctor. See Section 4 First Aid and label instructions for emergency medical advice. Get medical advice/attention if you feel unwell.

Do not eat, drink, or smoke when using this product.

Respiratory protection not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides. Get medical advice/attention if you feel unwell.

Dispose of contents/container in accordance with state and federal regulations. See Section 13 and product label for disposal instructions.

3. COMPOSITION / INFORMATION ON INGREDIENTS**COMPONENTS****CAS NO.****% BY WEIGHT**

SAFETY DATA SHEET

Fludioxonil Technical

Fludioxonil
Proprietary process related impurities

131341-86-1
Trade Secret

95.06 - 100
Trade Secret

Synonyms: 4-(2,2-difluoro-1,3-benzodioxol-4-yl)-1H-pyrrole-3-carbonitrile

Ingredients not precisely identified are proprietary or non-hazardous. Values are not product specifications

4. FIRST AID MEASURES

If on Skin or Clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

If Swallowed: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

If in Eyes: Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

If Inhaled: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Most Important symptoms/effects: Dermal irritation, Respiratory irritation

Indication of immediate medical attention and special treatment if needed: For ingestion there is no specific antidote available. Treat symptomatically.

5. FIRE FIGHTING MEASURES

Extinguishing Media: Recommended for large fires: alcohol-resistant foam, dry chemical, water spray, or carbon dioxide. Recommended for small fires: dry chemical or carbon dioxide.

Special Fire Fighting Procedures: Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full fire-fighting turn out gear. Toxic, irritating vapors may be formed if product is involved in a fire. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.

Unusual Fire and Explosion Hazards: Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source, is a potential dust explosion hazard. If water is used to fight fire, contain runoff, using dikes to prevent contamination of water supplies. Dispose of fire control water later.

Hazardous Decomposition Materials (Under Fire Conditions): May produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Environmental Precautions: Prevent material from entering public sewer systems or any waterways. Do not flush to drain. Large spills to soil or similar surfaces may necessitate removal of topsoil. The affected area should be removed and placed in an appropriate container for disposal.

Methods for Containment: Dike spill using absorbent or impervious materials such as earth, sand or clay. Collect and contain contaminated absorbent and dike material for disposal.

Methods for Cleanup and Disposal: Avoid creation of dusty conditions. If dry, sweep or scoop up material and place into container for disposal. If wet, pump any free liquid into an appropriate closed container. Decontaminate tools and equipment following cleanup. See Section 13: DISPOSAL CONSIDERATIONS for more information.

Other Information: Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.

Avoid dispersal of dust in the air (i.e., clearing dust surfaces with compressed air).

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE

HANDLING:

Minimize dust generation and accumulation. Routine housekeeping should be instituted to ensure that dusts do not accumulate on surfaces. Dry powders can build static electricity charges when subjected to the friction of transfer and mixing operations. Provide adequate precautions, such as electrical grounding and bonding, or inert atmospheres.

Avoid contact with eyes, skin or clothing. Avoid breathing dust. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/Personal Protective Equipment (PPE) immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove Personal Protective Equipment (PPE) immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

STORAGE:

Always use original container to store pesticides in a cool, dry secured warehouse or storage building. Do not store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use. Do not contaminate water, food or feed by storage or disposal.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls:

Where engineering controls are indicated by specific use conditions or a potential for excessive exposure, use local exhaust ventilation at the point of generation.

Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).

Personal Protective Equipment:

Eye/Face Protection: To avoid contact with eyes, wear chemical goggles or shielded safety glasses. An emergency eyewash or water supply should be readily accessible to the work area.

Skin Protection: To avoid contact with skin wear long-sleeved shirt and long pants, shoes, socks, and chemical resistant gloves. An emergency shower or water supply should be readily accessible to the work area.

Respiratory Protection: Not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides.

General Hygiene Considerations: Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material: 1) do not store, use and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored; 2) wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics or using the toilet.

Exposure Guidelines:

Component	OSHA		ACGIH		Unit
	TWA	STEL	TWA	STEL	
Fludioxonil	NE	NE	NE	NE	
Proprietary process impurities	N/A	N/A	N/A	N/A	

NE = Not Established

N/A= Not Applicable

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Green-beige to faintly yellow solid powder
Odor:	Odorless
Odor threshold:	No data available
pH:	6-8
Melting point/freezing point:	199.8 – 200.1° C
Initial boiling point and boiling range	No data available
Flash point:	Not applicable
Evaporation rate:	Not applicable
Flammability (solid, gas):	No data available
Upper/lower flammability or explosive limits:	No data available

SAFETY DATA SHEET

Fludioxonil Technical

Vapor pressure:	3.9 x 10 ⁻⁴ mPa (25° C)
Vapor density:	No data available
Relative density:	1.49 @ 20° C
Solubility(ies):	1.39 mg/ml
Partition coefficient: n-octanol/water:	2.95
Autoignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Note: Physical data are typical values, but may vary from sample to sample. A typical value should not be construed as a guaranteed analysis or as a specification.

10. STABILITY AND REACTIVITY

Reactivity: Not reactive

Chemical Stability: This material is stable under normal handling and storage conditions.

Possibility of Hazardous Reactions: Will not occur.

Conditions to Avoid: Keep away from heat, sparks and open flame. Minimize dust generate and accumulation.

Incompatible Materials: Strong oxidizing agents: bases and acids.

Hazardous Decomposition Products: Under fire conditions may produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Dermal contact, Inhalation

Symptoms of Exposure: Dermal irritation, Respiratory inhalation

Delayed, immediate and chronic effects of exposure: Dermal irritation, Respiratory inhalation

Toxicological Data:

Data from laboratory studies conducted on Fludioxonil Technical:

Oral: Rat LD₅₀: >5,000 mg/kg

Dermal: Rabbit LD₅₀: >2,000 mg/kg

Inhalation: Rat 4-hr LC₅₀: > 2.6 mg/L

Eye Irritation: Rabbit: Slightly irritating

Skin Irritation: Rabbit: Non irritating

Skin Sensitization: Not a contact sensitizer in guinea pigs following repeated skin exposure.

Subchronic (Target Organ) Effects: Repeated overexposure to fludioxonil may cause effects in the kidney and liver.

Carcinogenicity / Chronic Health Effects: Fludioxonil did not cause cancer in laboratory animals. EPA has classified fludioxonil as a Group D chemical – not classifiable as to human carcinogenicity.

Reproductive Toxicity: In animal studies, Fludioxonil has been shown not to interfere with reproduction.

Developmental Toxicity: Fludioxonil did not cause birth defects in animals.

Genotoxicity: In vitro bacterial assays and animal tests with fludioxonil did not demonstrate mutagenic effects.

Assessment Carcinogenicity: None listed with ACGIH, IARC, NTP or OSHA.

12. ECOLOGICAL INFORMATION

Environmental Hazards:

This product is toxic to fish and aquatic invertebrates.

Ecotoxicity:

Data on Fludioxonil Technical:

Bluegill 96-hour LC₅₀: 0.74 ppm

Rainbow Trout 96-hour LC₅₀: 0.47 ppm

Daphnia 48-hour EC₅₀: 0.90 ppm

Bobwhite Quail Oral LD₅₀: >5,200 ppm

Mallard Duck 8-day Dietary LC₅₀: >5,200 ppm

Honey Bee Oral LD₅₀: > 25 µg/bee

Environmental Fate:

Fludioxonil, does not bioaccumulate, however it is persistent in soil and is stable in water. It has low mobility in soil. The material sinks in water (after 24 hours).

13. DISPOSAL CONSIDERATIONS**Waste Disposal Method:**

Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Handling and Disposal:

Bags: Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Fiber drums: Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

Plastic Drums: Nonrefillable Container. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling, if available, or puncture and dispose of in an approved sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Triple rinse containers with capacities equal to or less than 5 gallons or 50 lbs as follows: Empty the remaining contents in application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Triple rinse containers with capacities greater than 5 gallons or 50 lbs as follows: Empty the remaining contents into manufacturing equipment. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Empty the rinsate into manufacturing equipment, or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into manufacturing equipment and drain for 10 seconds after the flow begins to drip. Hold container upside down over manufacturing equipment, or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

14. TRANSPORTATION INFORMATION

Follow the precautions indicated in Section 7: HANDLING AND STORAGE of this SDS.

DOT

UN 3077, Environmentally Hazardous Substance, Solid, N.O.S. (Fludioxonil), 9, PG III

IMDG

UN 3077, Environmentally Hazardous Substance, Solid, N.O.S. (Fludioxonil), 9, PG III, Marine Pollutant

IATA

UN 3077, Environmentally Hazardous Substance, Solid, N.O.S. (Fludioxonil), 9, PG III)

15. REGULATORY INFORMATION**EPA FIFRA INFORMATION**

This chemical is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

CAUTION. Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

U.S. FEDERAL REGULATIONS

TSCA Inventory: This product is exempted from TSCA because it is solely for FIFRA regulated use.

SAFETY DATA SHEET

Fludioxonil Technical

SARA Hazard Notification/Reporting:

Hazard Categories Under Criteria of SARA Title III Rules (40 CFR Part 370):

Not listed

Section 313 Toxic Chemical(s):

None

Reportable Quantity (RQ) under U.S. CERCLA:

None

RCRA Waste Code:

Under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste.

State Information:

Other state regulations may apply. Check individual state requirements.

California Proposition 65: Not Listed.

16. OTHER INFORMATION

National Fire Protection Association (NFPA) Hazard Rating:

Rating for this product: Health: 1 Flammability: 1 Reactivity: 0

Hazards Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

This Safety Data Sheet (SDS) serves different purposes than and DOES NOT REPLACE OR MODIFY THE EPA-ACCEPTED PRODUCT LABELING (attached to and accompanying the product container). This SDS provides important health, safety and environmental information for employers, employees, emergency responders and others handling large quantities of the product in activities generally other than product use, while the labeling provides that information specifically for product use in the ordinary course.

Use, storage and disposal of pesticide products are regulated by the EPA under the authority of the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) through the product labeling, and all necessary and appropriate precautionary, use, storage, and disposal information is set forth on that labeling. It is a violation of Federal law to use a pesticide product in any manner not prescribed on the EPA-accepted label.

Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, Nufarm Americas Inc. makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving same will make their own determination as to its suitability for their purposes prior to use. In no event will Nufarm Americas Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon Information. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

Date of Issue: February 9, 2015

Supersedes: January 19, 2015



United States
ENVIRONMENTAL PROTECTION AGENCY

OMB Control No. 2070-0020
Expires on 11/30/2016

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.

Part 1: To Be Completed by Importer of record or Licensed Customs Broker

1. Name and Complete Address of Licenced Customs Broker

Expeditors International Attn: Kim Caruso
849 Thomas Drive
Bensenville, IL 60106 T:630-616-2318

2. Name and Complete Address of Importer of Record

Nufarm Americas Inc.
11901 South Austin Avenue
Alsip, IL 60803 T: 708-377-1330

☒ Return Form to this Address

☐ Return to this Address

3. Name and Complete Address of Shipper

Nutrichem Co., LTD
Building D-1, No. 66 Xixiaokou Road
Haidian District, Beijing 100192,
P.R. China
110108777062155

4. EPA Registration Number

35935-92

5. EPA Producer Establishment No.

88106-CHN-001

6. Brand Name of Product

Fludioxonil Technical

7. Active Ingredients and Percentage of Each

Fludioxonil 99.0%

8. Unit Size

25 Kg Cartons

9. Quantity

32

10. Total Net Weight

800 Kg

11. Country of Origin

China

12. Port of Entry

Chicago Illinois

13. Name and Complete Address of Carrier

AMERICAN AIRLINES CARGO
ON BOARD: AA186
AIR WAYBILL NUMBER 001-9252 5090

14. Entry Number

231-0274660-4

15. Anticipated Entry Date

September 8, 2015

17. Location of Goods for Examination after Importation

Nufarm Americas, Inc.
11901 S Austin Ave
Alsip, IL 60803 Phone: 708-377-1388

16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment--see instructions.)

18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)

☐ 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____

☐ 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____

☐ 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____

EPA Registration Number: 35935-92	Product Name: Fludioxonil Technical
Total Net Weight: 800 Kg	Entry Number: 231-0274660-4

☐ 18d. A Pesticide distributed for research and development purposes without an Experimental Use Permit.

☐ 18e. A pesticide transferred solely for export. Domestic Producer Establishment Number: _____

☐ 18f. A pesticide distributed under an emergency exemption. Emergency Exemption Number: _____

☐ 18g. A pesticide transferred for the purposes of disposal.

☐ 18h. Other. Provide an explanation including the intended use and a description of why the product is being imported into the United States in Block 19 -- Remarks.

19. Remarks. Provide additional information here. It is recommended that a copy of the label affixed to the product be submitted with the NOA.

AIR WAYBILL NUMBER 001-9252 5090

Certification

I certify that the statements I made on this form and all attachments thereto are true, accurate and complete. I acknowledge that any knowingly false or misleading statement may be punishable by fine or imprisonment or both under applicable law.

20. Printed Name of Importer of Record or Licensed Customs Broker	Vic Sweetwood	Telephone No.:	708-377-1365
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21. Signature of Importer of Record or Licensed Customs Broker:		Date:	September 8, 2015
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Part II: To Be Completed by U.S. Environmental Protection Agency

Action to be taken by U.S. Customs and Border Protection:

☒ Release Shipment ☐ Detain for inspection ☐ Release shipment to consignee under bond. Shipment must be held intact pending inspection.

☐ Other. (Specify) _____

Remarks:

Signature and Title of EPA Official:		Date:	9/10/15
--------------------------------------	--	-------	---------

Part III: To Be Completed by U.S. Customs and Border Protection

The information shown in Part I was compared with the entry papers for this shipment and no discrepancies were noted. The shipment was handled as instructed by EPA in Part II. Any deviations should be brought to the attention of EPA before releasing the shipment and should be noted in "Remarks."

Remarks:

Signature of District Director of Customs:	Date:
--	-------

Paperwork Reduction Act Notice: The estimated average time to read the instructions and complete this form is 26 minutes. Send comments regarding the burden estimates or any other aspect of this collection of information to: Director, Collection Strategies Division, Office of Environmental Information (OEI), U.S. Environmental Protection Agency (Mail Code 2822), 1200 Pennsylvania Avenue, NW, Washington, DC 20460. Include OMB number 2070-0020 in any correspondence.

FLUDIOXONIL TECHNICAL

FOR MANUFACTURING USE ONLY

ACTIVE INGREDIENT:	99.0%
Fludioxonil	1.0%
OTHER INGREDIENTS:	
TOTAL	100.0%

EPA Reg. No. 35935-92

EPA Est. No. 88106-CHN-001

KEEP OUT OF REACH OF CHILDREN

CAUTION

For Chemical Spill, Leak, Fire, or Exposure Call CHEMTREC (800) 424-9300
For Medical Emergencies Only Call (877) 325-1840

FIRST AID	
IF IN EYES	<ul style="list-style-type: none">Hold eye open and rinse slowly and gently with water for 15 to 20 minutes.Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.Call a poison control center or doctor for treatment advice.
IF ON SKIN OR CLOTHING	<ul style="list-style-type: none">Take off contaminated clothing.Rinse skin immediately with plenty of water for 15 to 20 minutes.Call a poison control center or doctor for treatment advice.
IF INHALED	<ul style="list-style-type: none">Move person to fresh air.If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible.Call a poison control center or doctor for further treatment advice.
IF SWALLOWED	<ul style="list-style-type: none">Call a poison control center or doctor immediately for treatment advice.Have person sip a glass of water if able to swallow.DO NOT induce vomiting unless told to do so by a poison control center or doctor.DO NOT give anything by mouth to an unconscious person.
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.	

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION

Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

ENVIRONMENTAL HAZARDS

This product is toxic to fish and aquatic invertebrates. DO NOT discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. DO NOT discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. This product is intended for the formulation of fungicide products. This product may be used to formulate products for specific use(s) not listed on the MP label if the formulator, user group, or grower has complied with the U.S. EPA data submission requirements regarding the support of such use(s).

FOR MANUFACTURING USE ONLY INTO A FUNGICIDE FOR THE FOLLOWING USES:

- Seed Treatment Uses:** Root and Tuber vegetables, Bulb vegetables, Leafy vegetables, except Brassica vegetables, Brassica (Cole) leafy vegetables, Legume vegetables (succulent or dried), Fruiting vegetables (except cucurbits), Cucurbit vegetables, Cereal grains, Nongrass animal feeds (forage, fodder, straw, and hay), Herbs and Spices, Rape, Cotton, Peanut, Crambe, Flax, Jojoba, Lesquerella, Safflower, and Sunflower.
- Post Harvest Uses:** Citrus fruit group (Crop group 10), Kiwi, Pome fruit group (Crop group 11), Pomegranate, Stone fruit group (Crop group 12), and Sweet potato.
- Terrestrial Nonfood Uses:** Ornamentals grown in interiorscapes, field nursery plantings, container nurseries, forest nurseries, residential and commercial landscapes, greenhouses, lath and shade houses, or other enclosed structures; vegetables including seedlings and transplants grown in greenhouses, lath and shade houses, or other enclosed structures.
- Uses for which the US EPA has accepted the required data and/or citations of data that the formulator has submitted in support of registration; and
- Uses for experimental purposes that are in compliance with US EPA requirements

STORAGE AND DISPOSAL

DO NOT contaminate water, food, or feed by storage and disposal.

PESTICIDE STORAGE: Always use original container to store pesticides in a cool, dry, secured warehouse or storage building. DO NOT store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER HANDLING:

Plastic or Paper Bags: Nonrefillable container. DO NOT reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

WARRANTY DISCLAIMER AND LIMITATION OF LIABILITY

The directions for use of this product must be followed carefully. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, (1) THE GOODS DELIVERED TO YOU ARE FURNISHED "AS IS" BY MANUFACTURER OR SELLER AND (2) MANUFACTURER AND SELLER MAKE NO WARRANTIES, GUARANTEES, OR REPRESENTATIONS OF ANY KIND TO BUYER OR USER, EITHER EXPRESS OR IMPLIED, OR BY USAGE OF TRADE, STATUTORY OR OTHERWISE, WITH REGARD TO THE PRODUCT SOLD, INCLUDING, BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, USE, OR ELIGIBILITY OF THE PRODUCT FOR ANY PARTICULAR TRADE USAGE. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, BUYER'S OR USER'S EXCLUSIVE REMEDY, AND MANUFACTURER'S OR SELLER'S TOTAL LIABILITY SHALL BE FOR DAMAGES NOT EXCEEDING THE COST OF THE PRODUCT.

If you do not agree with or do not accept any of the directions for use, the warranty disclaimers, or limitations on liability, do not use the product, and return it unopened to the Seller, and the purchase price will be refunded.

RV051115

MADE IN CHINA

NET WEIGHT: 55.1 LBS (25 KG)

Manufactured for:
NUFARM LIMITED
4020 Aerial Center Parkway, Suite 101
Morrisville, NC 27560



**1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**

Product Name: Fludioxonil Technical
EPA Reg. No.: 35935-92
Product Type: Fungicide - For Manufacturing Use Only
Company Name: Nufarm Limited.
4020 Aerial Center Parkway
Morrisville, NC 27560
1-800-345-3330

Telephone Numbers: For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident,
Call CHEMTREC Day or Night: 1-800-424-9300
For Medical Emergencies Only, Call 1-877-325-1840

This product is an EPA FIFRA registered pesticide. Some classifications on this SDS are not the same as on the FIFRA label. Certain sections are superseded by federal law governed by EPA for a registered pesticide. Please see Section 15. REGULATORY INFORMATION for explanation.

2. HAZARDS IDENTIFICATION**HEALTH HAZARDS:**

Acute toxicity, inhalation	Category 4
Specific target organ toxicity – Repeated exposure	Category 2

ENVIRONMENTAL HAZARDS:

Hazardous to aquatic environment, acute	Category 1
Hazardous to aquatic environment, chronic	Category 1

SIGNAL WORD:

WARNING

HAZARD STATEMENTS:

Harmful if inhaled. May cause damage to organs (liver, kidney) through prolonged or repeated exposure. Very toxic to aquatic life with long lasting effects.

**PRECAUTIONARY STATEMENTS**

Do not breathe dust, fumes, gas, mist, vapors or spray. Use only outdoors or in a well-ventilated area. Call a poison control center or doctor if you feel unwell. If exposed or concerned: Call a poison center/doctor. See Section 4 First Aid and label instructions for emergency medical advice. Get medical advice/attention if you feel unwell.

Do not eat, drink, or smoke when using this product.

Respiratory protection not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides. Get medical advice/attention if you feel unwell.

Dispose of contents/container in accordance with state and federal regulations. See Section 13 and product label for disposal instructions.

3. COMPOSITION / INFORMATION ON INGREDIENTS

COMPONENTS

CAS NO.

% BY WEIGHT

SAFETY DATA SHEET

Fludioxonil Technical

Fludioxonil
Proprietary process related impurities

131341-86-1
Trade Secret

95.06 - 100
Trade Secret

Synonyms: 4-(2,2-difluoro-1,3-benzodioxol-4-yl)-1H-pyrrole-3-carbonitrile

Ingredients not precisely identified are proprietary or non-hazardous. Values are not product specifications

4. FIRST AID MEASURES

If on Skin or Clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

If Swallowed: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

If in Eyes: Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

If Inhaled: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Most Important symptoms/effects: Dermal irritation, Respiratory irritation

Indication of Immediate medical attention and special treatment if needed: For ingestion there is no specific antidote available. Treat symptomatically.

5. FIRE FIGHTING MEASURES

Extinguishing Media: Recommended for large fires: alcohol-resistant foam, dry chemical, water spray, or carbon dioxide. Recommended for small fires: dry chemical or carbon dioxide.

Special Fire Fighting Procedures: Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full fire-fighting turn out gear. Toxic, irritating vapors may be formed if product is involved in a fire. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.

Unusual Fire and Explosion Hazards: Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source, is a potential dust explosion hazard. If water is used to fight fire, contain runoff, using dikes to prevent contamination of water supplies. Dispose of fire control water later.

Hazardous Decomposition Materials (Under Fire Conditions): May produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Environmental Precautions: Prevent material from entering public sewer systems or any waterways. Do not flush to drain. Large spills to soil or similar surfaces may necessitate removal of topsoil. The affected area should be removed and placed in an appropriate container for disposal.

Methods for Containment: Dike spill using absorbent or impervious materials such as earth, sand or clay. Collect and contain contaminated absorbent and dike material for disposal.

Methods for Cleanup and Disposal: Avoid creation of dusty conditions. If dry, sweep or scoop up material and place into container for disposal. If wet, pump any free liquid into an appropriate closed container. Decontaminate tools and equipment following cleanup. See Section 13: DISPOSAL CONSIDERATIONS for more information.

Other Information: Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.

Avoid dispersal of dust in the air (i.e., clearing dust surfaces with compressed air).

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE**HANDLING:**

Minimize dust generation and accumulation. Routine housekeeping should be instituted to ensure that dusts do not accumulate on surfaces. Dry powders can build static electricity charges when subjected to the friction of transfer and mixing operations. Provide adequate precautions, such as electrical grounding and bonding, or inert atmospheres.

Avoid contact with eyes, skin or clothing. Avoid breathing dust. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/Personal Protective Equipment (PPE) immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove Personal Protective Equipment (PPE) immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

STORAGE:

Always use original container to store pesticides in a cool, dry secured warehouse or storage building. Do not store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use. Do not contaminate water, food or feed by storage or disposal.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION**Engineering Controls:**

Where engineering controls are indicated by specific use conditions or a potential for excessive exposure, use local exhaust ventilation at the point of generation.

Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).

Personal Protective Equipment:

Eye/Face Protection: To avoid contact with eyes, wear chemical goggles or shielded safety glasses. An emergency eyewash or water supply should be readily accessible to the work area.

Skin Protection: To avoid contact with skin wear long-sleeved shirt and long pants, shoes, socks, and chemical resistant gloves. An emergency shower or water supply should be readily accessible to the work area.

Respiratory Protection: Not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides.

General Hygiene Considerations: Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material: 1) do not store, use and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored; 2) wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics or using the toilet.

Exposure Guidelines:

Component	OSHA		ACGIH		Unit
	TWA	STEL	TWA	STEL	
Fludioxonil	NE	NE	NE	NE	
Proprietary process impurities	N/A	N/A	N/A	N/A	

NE = Not Established

N/A= Not Applicable

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Green-beige to faintly yellow solid powder
Odor:	Odorless
Odor threshold:	No data available
pH:	6-8
Melting point/freezing point:	199.8 – 200.1° C
Initial boiling point and boiling range	No data available
Flash point:	Not applicable
Evaporation rate:	Not applicable
Flammability (solid, gas):	No data available
Upper/lower flammability or explosive limits:	No data available

SAFETY DATA SHEET

Fludioxonil Technical

Vapor pressure:	3.9 x 10 ⁻⁴ mPa (25° C)
Vapor density:	No data available
Relative density:	1.49 @ 20° C
Solubility(ies):	1.39 mg/ml
Partition coefficient: n-octanol/water:	2.95
Autoignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Note: Physical data are typical values, but may vary from sample to sample. A typical value should not be construed as a guaranteed analysis or as a specification.

10. STABILITY AND REACTIVITY

Reactivity: Not reactive

Chemical Stability: This material is stable under normal handling and storage conditions.

Possibility of Hazardous Reactions: Will not occur.

Conditions to Avoid: Keep away from heat, sparks and open flame. Minimize dust generate and accumulation.

Incompatible Materials: Strong oxidizing agents: bases and acids.

Hazardous Decomposition Products: Under fire conditions may produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Dermal contact, Inhalation

Symptoms of Exposure: Dermal irritation, Respiratory inhalation

Delayed, immediate and chronic effects of exposure: Dermal irritation, Respiratory inhalation

Toxicological Data:

Data from laboratory studies conducted on Fludioxonil Technical:

Oral: Rat LD₅₀: >5,000 mg/kg

Dermal: Rabbit LD₅₀: >2,000 mg/kg

Inhalation: Rat 4-hr LC₅₀: > 2.6 mg/L

Eye Irritation: Rabbit: Slightly irritating

Skin Irritation: Rabbit: Non irritating

Skin Sensitization: Not a contact sensitizer in guinea pigs following repeated skin exposure.

Subchronic (Target Organ) Effects: Repeated overexposure to fludioxonil may cause effects in the kidney and liver.

Carcinogenicity / Chronic Health Effects: Fludioxonil did not cause cancer in laboratory animals. EPA has classified fludioxonil as a Group D chemical – not classifiable as to human carcinogenicity.

Reproductive Toxicity: In animal studies, Fludioxonil has been shown not to interfere with reproduction.

Developmental Toxicity: Fludioxonil did not cause birth defects in animals.

Genotoxicity: In vitro bacterial assays and animal tests with fludioxonil did not demonstrate mutagenic effects.

Assessment Carcinogenicity: None listed with ACGIH, IARC, NTP or OSHA.

12. ECOLOGICAL INFORMATION

Environmental Hazards:

This product is toxic to fish and aquatic invertebrates.

Ecotoxicity:

Data on Fludioxonil Technical:

Bluegill 96-hour LC₅₀:	0.74 ppm	Bobwhite Quail Oral LD₅₀:	>5,200 ppm
Rainbow Trout 96-hour LC₅₀:	0.47 ppm	Mallard Duck 8-day Dietary LC₅₀:	>5,200 ppm
Daphnia 48-hour EC₅₀:	0.90 ppm	Honey Bee Oral LD₅₀:	> 25 µg/bee

Environmental Fate:

Fludioxonil, does not bioaccumulate, however it is persistent in soil and is stable in water. It has low mobility in soil. The material sinks in water (after 24 hours).

13. DISPOSAL CONSIDERATIONS**Waste Disposal Method:**

Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Handling and Disposal:

Bags: Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Fiber drums: Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

Plastic Drums: Nonrefillable Container. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling, if available, or puncture and dispose of in an approved sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Triple rinse containers with capacities equal to or less than 5 gallons or 50 lbs as follows: Empty the remaining contents in application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Triple rinse containers with capacities greater than 5 gallons or 50 lbs as follows: Empty the remaining contents into manufacturing equipment. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Empty the rinsate into manufacturing equipment, or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into manufacturing equipment and drain for 10 seconds after the flow begins to drip. Hold container upside down over manufacturing equipment, or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

14. TRANSPORTATION INFORMATION

Follow the precautions indicated in Section 7: HANDLING AND STORAGE of this SDS.

DOT**< 882 pounds per completed package:**

Not regulated by DOT unless shipped by water. See IMO / IMDG description.

≥ 882 pounds per completed package:

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IMO / IMDG

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IATA

Not regulated

15. REGULATORY INFORMATION**EPA FIFRA INFORMATION**

This chemical is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

SAFETY DATA SHEET

Fludioxonil Technical

CAUTION. Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

U.S. FEDERAL REGULATIONS

TSCA Inventory: This product is exempted from TSCA because it is solely for FIFRA regulated use.

SARA Hazard Notification/Reporting:

Hazard Categories Under Criteria of SARA Title III Rules (40 CFR Part 370):

Not listed

Section 313 Toxic Chemical(s):

None

Reportable Quantity (RQ) under U.S. CERCLA:

None

RCRA Waste Code:

Under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste.

State Information:

Other state regulations may apply. Check individual state requirements.

California Proposition 65: Not Listed.

16. OTHER INFORMATION

National Fire Protection Association (NFPA) Hazard Rating:

Rating for this product: Health: 1 Flammability: 1 Reactivity: 0

Hazards Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

This Safety Data Sheet (SDS) serves different purposes than and DOES NOT REPLACE OR MODIFY THE EPA-ACCEPTED PRODUCT LABELING (attached to and accompanying the product container). This SDS provides important health, safety and environmental information for employers, employees, emergency responders and others handling large quantities of the product in activities generally other than product use, while the labeling provides that information specifically for product use in the ordinary course.

Use, storage and disposal of pesticide products are regulated by the EPA under the authority of the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) through the product labeling, and all necessary and appropriate precautionary, use, storage, and disposal information is set forth on that labeling. It is a violation of Federal law to use a pesticide product in any manner not prescribed on the EPA-accepted label.

Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, Nufarm Americas Inc. makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving same will make their own determination as to its suitability for their purposes prior to use. In no event will Nufarm Americas Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon Information. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

Date of Issue: May 29, 2015

Supersedes: February 9, 2015



United States

OMB Control No. 2070-0020
Expires on 11/30/2016**ENVIRONMENTAL PROTECTION AGENCY**

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.**Part 1: To Be Completed by Importer of record or Licensed Customs Broker**

1. Name and Complete Address of Licenced Customs Broker

Expeditors International Attn: Kristen Karg
849 Thomas Drive
Bensenville, IL 60106 T:630-616-2318

2. Name and Complete Address of Importer of Record

Nufarm Americas Inc.
11901 South Austin Avenue
Alsip, IL 60803 T: 708-377-1330☒ Return Form to this Address☐ Return to this Address

3. Name and Complete Address of Shipper

Nutrichem Co., LTD
Building D-1, No. 66 Xixiaokou Road
Haidian District, Beijing 100192,
P.R. China
110108777062155

4. EPA Registration Number

35935-92

5. EPA Producer Establishment No.

88106-CHN-001

6. Brand Name of Product

Fludioxonil Technical

7. Active Ingredients and Percentage of Each

Fludioxonil 99.0%

8. Unit Size

25 Kg Cartons

9. Quantity

40

10. Total Net Weight

1,000 Kg

11. Country of Origin

China

12. Port of Entry

Chicago Illinois

13. Name and Complete Address of Carrier

AMERICAN AIRLINES CARGO
ON BOARD: AA186
AIR WAYBILL NUMBER 001-9252 5123

14. Entry Number

231-0289267-1

15. Anticipated Entry Date

October 21, 2015

17. Location of Goods for Examination after Importation

Nufarm Americas, Inc.
11901 S Austin Ave
Alsip, IL 60803 Phone: 708-377-1388

16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment—see instructions.)

18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)

☐ 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____☐ 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____☐ 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____

FLUDIOXONIL TECHNICAL

FOR MANUFACTURING USE ONLY

ACTIVE INGREDIENT:	99.0%
Fludioxonil.....	1.0%
OTHER INGREDIENTS:	100.0%
TOTAL.....	

EPA Reg. No. 35935-92

EPA Est. No. 88106-CHN-001

KEEP OUT OF REACH OF CHILDREN
CAUTION

For Chemical Spill, Leak, Fire, or Exposure Call CHEMTREC (800) 424-8300
For Medical Emergencies Only Call (877) 325-1840

FIRST AID	
IF IN EYES	<ul style="list-style-type: none"> Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.
IF ON SKIN OR CLOTHING	<ul style="list-style-type: none"> Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.
IF INHALED	<ul style="list-style-type: none"> Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.
IF SWALLOWED	<ul style="list-style-type: none"> Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. DO NOT induce vomiting unless told to do so by a poison control center or doctor. DO NOT give anything by mouth to an unconscious person.
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.	

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION

Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

ENVIRONMENTAL HAZARDS

This product is toxic to fish and aquatic invertebrates. DO NOT discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. DO NOT discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. This product is intended for the formulation of fungicide products. This product may be used to formulate products for specific use(s) not listed on the MIP label if the formulator, user group, or grower has complied with the U.S. EPA data submission requirements regarding the support of such use(s).

FOR MANUFACTURING USE ONLY INTO A FUNGICIDE FOR THE FOLLOWING USES:

- Seed Treatment Uses:** Root and Tuber vegetables, Bulb vegetables, Leafy vegetables, except Brassica vegetables, Brassica (Cole) leafy vegetables, Legume vegetables (succulent or dried), Fruiting vegetables (except cucurbits), Cucurbit vegetables, Cereal grains, Nongrass animal feeds (forage, fodder, straw, and hay), Herbs and Spices, Rape, Cotton, Peanut, Crambe, Flax, Jojoba, Lesquerella, Safflower, and Sunflower.
- Post Harvest Uses:** Citrus fruit group (Crop group 10), Kiwi, Pome fruit group (Crop group 11), Pomegranate, Stone fruit group (Crop group 12), and Sweet potato.
- Terrestrial Nonfood Uses:** Ornamentals grown in interiorscapes, field nursery plantings, container nurseries, forest nurseries, residential and commercial landscapes, greenhouses, lath and shade houses, or other enclosed structures; vegetables including seedlings and transplants grown in greenhouses, lath and shade houses, or other enclosed structures.
- Uses for which the US EPA has accepted the required data and/or citations of data that the formulator has submitted in support of registration; and
- Uses for experimental purposes that are in compliance with US EPA requirements

MADE IN CHINA

NET WEIGHT: 55.1 LBS (25 KG)

Manufactured for:
NUFARM LIMITED
4020 Aerial Center Parkway, Suite 101
Morrisville, NC 27560



STORAGE AND DISPOSAL

DO NOT contaminate water, food, or feed by storage and disposal.

PESTICIDE STORAGE: Always use original container to store pesticides in a cool, dry, secured warehouse or storage building. DO NOT store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER HANDLING:

Plastic or Paper Bags: Nonrefillable container. DO NOT reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

WARRANTY DISCLAIMER AND LIMITATION OF LIABILITY

The directions for use of this product must be followed carefully. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, (1) THE GOODS DELIVERED TO YOU ARE FURNISHED "AS IS" BY MANUFACTURER OR SELLER AND (2) MANUFACTURER AND SELLER MAKE NO WARRANTIES, GUARANTEES, OR REPRESENTATIONS OF ANY KIND TO BUYER OR USER, EITHER EXPRESS OR IMPLIED, OR BY USAGE OF TRADE, STATUTORY OR OTHERWISE, WITH REGARD TO THE PRODUCT SOLD, INCLUDING, BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, USE, OR ELIGIBILITY OF THE PRODUCT FOR ANY PARTICULAR TRADE USAGE. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, BUYER'S OR USER'S EXCLUSIVE REMEDY, AND MANUFACTURER'S OR SELLER'S TOTAL LIABILITY SHALL BE FOR DAMAGES NOT EXCEEDING THE COST OF THE PRODUCT.

If you do not agree with or do not accept any of the directions for use, the warranty disclaimers, or limitations on liability, do not use the product, and return it unopened to the Seller, and the purchase price will be refunded.

RV051115

SAFETY DATA SHEET

Fludioxonil Technical



1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: **Fludioxonil Technical**
EPA Reg. No.: 35935-92
Product Type: Fungicide - For Manufacturing Use Only

Company Name: Nufarm Limited.
4020 Aerial Center Parkway
Morrisville, NC 27560
1-800-345-3330

Telephone Numbers: For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident,
Call CHEMTREC Day or Night: 1-800-424-9300
For Medical Emergencies Only, Call 1-877-325-1840

This product is an EPA FIFRA registered pesticide. Some classifications on this SDS are not the same as on the FIFRA label. Certain sections are superseded by federal law governed by EPA for a registered pesticide. Please see Section 15. REGULATORY INFORMATION for explanation.

2. HAZARDS IDENTIFICATION

HEALTH HAZARDS:

Acute toxicity, inhalation Category 4
Specific target organ toxicity - Repeated exposure Category 2

ENVIRONMENTAL HAZARDS:

Hazardous to aquatic environment, acute Category 1
Hazardous to aquatic environment, chronic Category 1

SIGNAL WORD:

WARNING

HAZARD STATEMENTS:

Harmful if inhaled. May cause damage to organs (liver, kidney) through prolonged or repeated exposure. Very toxic to aquatic life with long lasting effects.



PRECAUTIONARY STATEMENTS

Do not breathe dust, fumes, gas, mist, vapors or spray. Use only outdoors or in a well-ventilated area. Call a poison control center or doctor if you feel unwell. If exposed or concerned: Call a poison center/doctor. See Section 4 First Aid and label instructions for emergency medical advice. Get medical advice/attention if you feel unwell.

Do not eat, drink, or smoke when using this product.

Respiratory protection not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides. Get medical advice/attention if you feel unwell.

Dispose of contents/container in accordance with state and federal regulations. See Section 13 and product label for disposal instructions.

3. COMPOSITION / INFORMATION ON INGREDIENTS

COMPONENTS

CAS NO.

% BY WEIGHT

February 9, 2015

Page 1 of 6

SAFETY DATA SHEET

Fludioxonil Technical

Fludioxonil

Proprietary process related impurities

131341-86-1

Trade Secret

95.06 - 100

Trade Secret

Synonyms:

4-(2,2-difluoro-1,3-benzodioxol-4-yl)-1H-pyrrole-3-carbonitrile

Ingredients not precisely identified are proprietary or non-hazardous. Values are not product specifications

4. FIRST AID MEASURES

If on Skin or Clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

If Swallowed: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

If in Eyes: Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

If Inhaled: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Most important symptoms/effects: Dermal irritation, Respiratory irritation

Indication of immediate medical attention and special treatment if needed: For ingestion there is no specific antidote available. Treat symptomatically.

5. FIRE FIGHTING MEASURES

Extinguishing Media: Recommended for large fires: alcohol-resistant foam, dry chemical, water spray, or carbon dioxide. Recommended for small fires: dry chemical or carbon dioxide.

Special Fire Fighting Procedures: Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full fire-fighting turn out gear. Toxic, irritating vapors may be formed if product is involved in a fire. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.

Unusual Fire and Explosion Hazards: Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source, is a potential dust explosion hazard. If water is used to fight fire, contain runoff, using dikes to prevent contamination of water supplies. Dispose of fire control water later.

Hazardous Decomposition Materials (Under Fire Conditions): May produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Environmental Precautions: Prevent material from entering public sewer systems or any waterways. Do not flush to drain. Large spills to soil or similar surfaces may necessitate removal of topsoil. The affected area should be removed and placed in an appropriate container for disposal.

Methods for Containment: Dike spill using absorbent or impervious materials such as earth, sand or clay. Collect and contain contaminated absorbent and dike material for disposal.

Methods for Cleanup and Disposal: Avoid creation of dusty conditions. If dry, sweep or scoop up material and place into container for disposal. If wet, pump any free liquid into an appropriate closed container. Decontaminate tools and equipment following cleanup. See Section 13: DISPOSAL CONSIDERATIONS for more information.

Other Information: Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.

Avoid dispersal of dust in the air (i.e., clearing dust surfaces with compressed air).

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE

HANDLING:

Minimize dust generation and accumulation. Routine housekeeping should be instituted to ensure that dusts do not accumulate on surfaces. Dry powders can build static electricity charges when subjected to the friction of transfer and mixing operations. Provide adequate precautions, such as electrical grounding and bonding, or inert atmospheres.

Avoid contact with eyes, skin or clothing. Avoid breathing dust. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/Personal Protective Equipment (PPE) immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove Personal Protective Equipment (PPE) immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

STORAGE:

Always use original container to store pesticides in a cool, dry secured warehouse or storage building. Do not store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use. Do not contaminate water, food or feed by storage or disposal.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls:

Where engineering controls are indicated by specific use conditions or a potential for excessive exposure, use local exhaust ventilation at the point of generation.

Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).

Personal Protective Equipment:

Eye/Face Protection: To avoid contact with eyes, wear chemical goggles or shielded safety glasses. An emergency eyewash or water supply should be readily accessible to the work area.

Skin Protection: To avoid contact with skin wear long-sleeved shirt and long pants, shoes, socks, and chemical resistant gloves. An emergency shower or water supply should be readily accessible to the work area.

Respiratory Protection: Not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides.

General Hygiene Considerations: Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material: 1) do not store, use and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored; 2) wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics or using the toilet.

Exposure Guidelines:

Component	OSHA		ACGIH		Unit
	TWA	STEL	TWA	STEL	
Fludioxonil	NE	NE	NE	NE	
Proprietary process impurities	N/A	N/A	N/A	N/A	

NE = Not Established

N/A= Not Applicable

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Green-beige to faintly yellow solid powder
Odor:	Odorless
Odor threshold:	No data available
pH:	6-8
Melting point/freezing point:	199.8 – 200.1° C
Initial boiling point and boiling range	No data available
Flash point:	Not applicable
Evaporation rate:	Not applicable
Flammability (solid, gas):	No data available
Upper/lower flammability or explosive limits:	No data available

SAFETY DATA SHEET

Fludioxonil Technical

Vapor pressure:	3.9 x 10 ⁻⁴ mPa (25° C)
Vapor density:	No data available
Relative density:	1.49 @ 20° C
Solubility(ies):	1.39 mg/ml
Partition coefficient: n-octanol/water:	2.95
Autoignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Note: Physical data are typical values, but may vary from sample to sample. A typical value should not be construed as a guaranteed analysis or as a specification.

10. STABILITY AND REACTIVITY

Reactivity: Not reactive

Chemical Stability: This material is stable under normal handling and storage conditions.

Possibility of Hazardous Reactions: Will not occur.

Conditions to Avoid: Keep away from heat, sparks and open flame. Minimize dust generate and accumulation.

Incompatible Materials: Strong oxidizing agents: bases and acids.

Hazardous Decomposition Products: Under fire conditions may produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Dermal contact, Inhalation

Symptoms of Exposure: Dermal irritation, Respiratory inhalation

Delayed, immediate and chronic effects of exposure: Dermal irritation, Respiratory inhalation

Toxicological Data:

Data from laboratory studies conducted on Fludioxonil Technical:

Oral: Rat LD₅₀: >5,000 mg/kg

Dermal: Rabbit LD₅₀: >2,000 mg/kg

Inhalation: Rat 4-hr LC₅₀: > 2.6 mg/L

Eye Irritation: Rabbit: Slightly irritating

Skin Irritation: Rabbit: Non irritating

Skin Sensitization: Not a contact sensitizer in guinea pigs following repeated skin exposure.

Subchronic (Target Organ) Effects: Repeated overexposure to fludioxonil may cause effects in the kidney and liver.

Carcinogenicity / Chronic Health Effects: Fludioxonil did not cause cancer in laboratory animals. EPA has classified fludioxonil as a Group D chemical – not classifiable as to human carcinogenicity.

Reproductive Toxicity: In animal studies, Fludioxonil has been shown not to interfere with reproduction.

Developmental Toxicity: Fludioxonil did not cause birth defects in animals.

Genotoxicity: In vitro bacterial assays and animal tests with fludioxonil did not demonstrate mutagenic effects.

Assessment Carcinogenicity: None listed with ACGIH, IARC, NTP or OSHA.

12. ECOLOGICAL INFORMATION

Environmental Hazards:

This product is toxic to fish and aquatic invertebrates.

Ecotoxicity:

Data on Fludioxonil Technical:

Bluegill 96-hour LC₅₀: 0.74 ppm

Rainbow Trout 96-hour LC₅₀: 0.47 ppm

Daphnia 48-hour EC₅₀: 0.90 ppm

Bobwhite Quail Oral LD₅₀: >5,200 ppm

Mallard Duck 8-day Dietary LC₅₀: >5,200 ppm

Honey Bee Oral LD₅₀: > 25 µg/bee

Environmental Fate:

Fludioxonil, does not bioaccumulate, however it is persistent in soil and is stable in water. It has low mobility in soil. The material sinks in water (after 24 hours).

13. DISPOSAL CONSIDERATIONS**Waste Disposal Method:**

Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Handling and Disposal:

Bags: Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Fiber drums: Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

Plastic Drums: Nonrefillable Container. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling, if available, or puncture and dispose of in an approved sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Triple rinse containers with capacities equal to or less than 5 gallons or 50 lbs as follows: Empty the remaining contents in application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Triple rinse containers with capacities greater than 5 gallons or 50 lbs as follows: Empty the remaining contents into manufacturing equipment. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Empty the rinsate into manufacturing equipment, or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into manufacturing equipment and drain for 10 seconds after the flow begins to drip. Hold container upside down over manufacturing equipment, or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

14. TRANSPORTATION INFORMATION

Follow the precautions indicated in Section 7: HANDLING AND STORAGE of this SDS.

DOT

< 882 pounds per completed package:

Not regulated by DOT unless shipped by water. See IMO / IMDG description.

≥ 882 pounds per completed package:

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IMO / IMDG

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IATA

Not regulated

15. REGULATORY INFORMATION**EPA FIFRA INFORMATION**

This chemical is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

SAFETY DATA SHEET

Fludioxonil Technical

CAUTION. Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

U.S. FEDERAL REGULATIONS

TSCA Inventory: This product is exempted from TSCA because it is solely for FIFRA regulated use.

SARA Hazard Notification/Reporting:

Hazard Categories Under Criteria of SARA Title III Rules (40 CFR Part 370):

Not listed

Section 313 Toxic Chemical(s):

None

Reportable Quantity (RQ) under U.S. CERCLA:

None

RCRA Waste Code:

Under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste.

State Information:

Other state regulations may apply. Check individual state requirements.

California Proposition 65: Not Listed.

16. OTHER INFORMATION

National Fire Protection Association (NFPA) Hazard Rating:

Rating for this product: Health: 1 Flammability: 1 Reactivity: 0

Hazards Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

This Safety Data Sheet (SDS) serves different purposes than and DOES NOT REPLACE OR MODIFY THE EPA-ACCEPTED PRODUCT LABELING (attached to and accompanying the product container). This SDS provides important health, safety and environmental information for employers, employees, emergency responders and others handling large quantities of the product in activities generally other than product use, while the labeling provides that information specifically for product use in the ordinary course.

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Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, Nufarm Americas Inc. makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving same will make their own determination as to its suitability for their purposes prior to use. In no event will Nufarm Americas Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon Information. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

Date of Issue: May 29, 2015

Supersedes: February 9, 2015



United States
ENVIRONMENTAL PROTECTION AGENCY

OMB Control No. 2070-0020
Expires on 11/30/2016

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.

Part 1: To Be Completed by Importer of record or Licensed Customs Broker

1. Name and Complete Address of Licenced Customs Broker			2. Name and Complete Address of Importer of Record		
Expeditors International Attn: Kristen Karg 849 Thomas Drive Bensenville, IL 60106 T:630-616-2318			Nufarm Americas Inc. 11901 South Austin Avenue Alsip, IL 60803 T: 708-377-1330		
<input checked="" type="checkbox"/> Return Form to this Address			<input type="checkbox"/> Return to this Address		
3. Name and Complete Address of Shipper			4. EPA Registration Number	5. EPA Producer Establishment No.	
Nutrichem Co., LTD Building D-1, No. 66 Xixiaokou Road Haidian District, Beijing 100192, P.R. China 110108777062155			35935-92	88106-CHN-001	
			6. Brand Name of Product		
			Fludioxonil Technical		
7. Active Ingredients and Percentage of Each					
Fludioxonil 99.0%					
8. Unit Size	9. Quantity	10. Total Net Weight	11. Country of Origin		
25 Kg Cartons	40	1,000 Kg	China		
12. Port of Entry			13. Name and Complete Address of Carrier		
Chicago Illinois			AMERICAN AIRLINES CARGO ON BOARD: AA186 AIR WAYBILL NUMBER 001-9091 6081		
14. Entry Number		15. Anticipated Entry Date			
231-0292007-6		October 30, 2015			
17. Location of Goods for Examination after Importation			16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment--see instructions.)		
Nufarm Americas, Inc. 11901 S Austin Ave Alsip, IL 60803 Phone: 708-377-1388					
18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)					
<input type="checkbox"/> 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____					
<input type="checkbox"/> 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____					
<input type="checkbox"/> 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____					

EPA Registration Number: 35935-92	Product Name: Fludioxonil Technical
Total Net Weight: 1,000 Kg	Entry Number: 231-0292007-6

- ☐ 18d. A Pesticide distributed for research and development purposes without an Experimental Use Permit.
- ☐ 18e. A pesticide transferred solely for export. Domestic Producer Establishment Number: _____
- ☐ 18f. A pesticide distributed under an emergency exemption. Emergency Exemption Number: _____
- ☐ 18g. A pesticide transferred for the purposes of disposal.
- ☐ 18h. Other. Provide an explanation including the intended use and a description of why the product is being imported into the United States in Block 19 -- Remarks.

19. Remarks. Provide additional information here. It is recommended that a copy of the label affixed to the product be submitted with the NOA.

AIR WAYBILL NUMBER 001-9091 6081

Certification

I certify that the statements I made on this form and all attachments thereto are true, accurate and complete. I acknowledge that any knowingly false or misleading statement may be punishable by fine or imprisonment or both under applicable law.

20. Printed Name of Importer of Record or Licensed Customs Broker

Vic Sweetwood

Telephone No.: 708-377-1365

21. Signature of Importer of Record or Licensed Customs Broker:

Vic Sweetwood

Date: October 30, 2015

Part II: To Be Completed by U.S. Environmental Protection Agency

Action to be taken by U.S. Customs and Border Protection:

- ☒ Release Shipment ☐ Detain for inspection ☐ Release shipment to consignee under bond. Shipment must be held intact pending inspection.
- ☐ Other. (Specify)

Remarks:

Signature and Title of EPA Official:

Daniel V. [Signature]

Date: NOV 05 2015

Part III: To Be Completed by U.S. Customs and Border Protection

The information shown in Part I was compared with the entry papers for this shipment and no discrepancies were noted. The shipment was handled as instructed by EPA in Part II. Any deviations should be brought to the attention of EPA before releasing the shipment and should be noted in "Remarks."

Remarks:

Signature of District Director of Customs:

Date:

Paperwork Reduction Act Notice: The estimated average time to read the instructions and complete this form is 26 minutes. Send comments regarding the burden estimates or any other aspect of this collection of information to: Director, Collection Strategies Division, Office of Environmental Information (OEI), U.S. Environmental Protection Agency (Mail Code 2822), 1200 Pennsylvania Avenue, NW, Washington, DC 20460. Include OMB number 2070-0020 in any correspondence.

FLUDIOXONIL TECHNICAL

FOR MANUFACTURING USE ONLY

ACTIVE INGREDIENT:	
Fludioxonil.....	99.0%
OTHER INGREDIENTS.....	1.0%
TOTAL.....	100.0%

EPA Reg. No. 35935-92

EPA Est. No. 88106-CHN-001

KEEP OUT OF REACH OF CHILDREN

CAUTION

For Chemical Spill, Leak, Fire, or Exposure Call CHEMTREC (800) 424-9300
For Medical Emergencies Only Call (877) 325-1840

FIRST AID	
IF IN EYES	<ul style="list-style-type: none">• Hold eye open and rinse slowly and gently with water for 15 to 20 minutes.• Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.• Call a poison control center or doctor for treatment advice.
IF ON SKIN OR CLOTHING	<ul style="list-style-type: none">• Take off contaminated clothing.• Rinse skin immediately with plenty of water for 15 to 20 minutes.• Call a poison control center or doctor for treatment advice.
IF INHALED	<ul style="list-style-type: none">• Move person to fresh air.• If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible.• Call a poison control center or doctor for further treatment advice.
IF SWALLOWED	<ul style="list-style-type: none">• Call a poison control center or doctor immediately for treatment advice.• Have person sip a glass of water if able to swallow.• DO NOT induce vomiting unless told to do so by a poison control center or doctor.• DO NOT give anything by mouth to an unconscious person.
HOT LINE NUMBER	
Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.	

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION

Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

ENVIRONMENTAL HAZARDS

This product is toxic to fish and aquatic invertebrates. DO NOT discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. DO NOT discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling. This product is intended for the formulation of fungicide products. This product may be used to formulate products for specific use(s) not listed on the MP label if the formulator, user group, or grower has complied with the U.S. EPA data submission requirements regarding the support of such use(s).

FOR MANUFACTURING USE ONLY INTO A FUNGICIDE FOR THE FOLLOWING USES:

- 1. Seed Treatment Uses:** Root and Tuber vegetables, Bulb vegetables, Leafy vegetables, except Brassica vegetables, Brassica (Cole) leafy vegetables, Legume vegetables (succulent or dried), Fruiting vegetables (except cucurbits), Cucurbit vegetables, Cereal grains, Nongrass animal feeds (forage, fodder, straw, and hay), Herbs and Spices, Rape, Cotton, Peanut, Crambe, Flax, Jojoba, Lesquerella, Safflower, and Sunflower.
- 2. Post Harvest Uses:** Citrus fruit group (Crop group 10), Kiwi, Pome fruit group (Crop group 11), Pomegranate, Stone fruit group (Crop group 12), and Sweet potato.
- 3. Terrestrial Nonfood Uses:** Ornamentals grown in interiorscapes, field nursery plantings, container nurseries, forest nurseries, residential and commercial landscapes, greenhouses, lath and shade houses, or other enclosed structures; vegetables including seedlings and transplants grown in greenhouses, lath and shade houses, or other enclosed structures.
- 4. Uses for which the US EPA has accepted the required data and/or citations of data that the formulator has submitted in support of registration; and**
- 5. Uses for experimental purposes that are in compliance with US EPA requirements**

STORAGE AND DISPOSAL

DO NOT contaminate water, food, or feed by storage and disposal.

PESTICIDE STORAGE: Always use original container to store pesticides in a cool, dry secured warehouse or storage building. DO NOT store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER HANDLING:

Plastic or Paper Bags: Nonrefillable container. DO NOT reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

WARRANTY DISCLAIMER AND LIMITATION OF LIABILITY

The directions for use of this product must be followed carefully. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, (1) THE GOODS DELIVERED TO YOU ARE FURNISHED "AS IS" BY MANUFACTURER OR SELLER AND (2) MANUFACTURER AND SELLER MAKE NO WARRANTIES, GUARANTEES, OR REPRESENTATIONS OF ANY KIND TO BUYER OR USER, EITHER EXPRESS OR IMPLIED, OR BY USAGE OF TRADE, STATUTORY OR OTHERWISE, WITH REGARD TO THE PRODUCT SOLD, INCLUDING, BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, USE, OR ELIGIBILITY OF THE PRODUCT FOR ANY PARTICULAR TRADE USAGE. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, BUYER'S OR USER'S EXCLUSIVE REMEDY, AND MANUFACTURER'S OR SELLER'S TOTAL LIABILITY SHALL BE FOR DAMAGES NOT EXCEEDING THE COST OF THE PRODUCT.

If you do not agree with or do not accept any of the directions for use, the warranty disclaimers, or limitations on liability, do not use the product, and return it unopened to the Seller, and the purchase price will be refunded.

RV051115

MADE IN CHINA

NET WEIGHT: 55.1 LBS (25 KG)

Manufactured for:
NUFARM LIMITED
4020 Aerial Center Parkway, Suite 101
Morrisville, NC 27560



**1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION**

Product Name: Fludioxonil Technical
EPA Reg. No.: 35935-92
Product Type: Fungicide - For Manufacturing Use Only
Company Name: Nufarm Limited.
4020 Aerial Center Parkway
Morrisville, NC 27560
1-800-345-3330

Telephone Numbers: For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident,
Call CHEMTREC Day or Night: 1-800-424-9300
For Medical Emergencies Only, Call 1-877-325-1840

This product is an EPA FIFRA registered pesticide. Some classifications on this SDS are not the same as on the FIFRA label. Certain sections are superseded by federal law governed by EPA for a registered pesticide. Please see Section 15. REGULATORY INFORMATION for explanation.

2. HAZARDS IDENTIFICATION**HEALTH HAZARDS:**

Acute toxicity, inhalation Category 4
Specific target organ toxicity – Repeated exposure Category 2

ENVIRONMENTAL HAZARDS:

Hazardous to aquatic environment, acute Category 1
Hazardous to aquatic environment, chronic Category 1

SIGNAL WORD:

WARNING

HAZARD STATEMENTS:

Harmful if inhaled. May cause damage to organs (liver, kidney) through prolonged or repeated exposure. Very toxic to aquatic life with long lasting effects.

**PRECAUTIONARY STATEMENTS**

Do not breathe dust, fumes, gas, mist, vapors or spray. Use only outdoors or in a well-ventilated area. Call a poison control center or doctor if you feel unwell. If exposed or concerned: Call a poison center/doctor. See Section 4 First Aid and label instructions for emergency medical advice. Get medical advice/attention if you feel unwell.

Do not eat, drink, or smoke when using this product.

Respiratory protection not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides. Get medical advice/attention if you feel unwell.

Dispose of contents/container in accordance with state and federal regulations. See Section 13 and product label for disposal instructions.

3. COMPOSITION / INFORMATION ON INGREDIENTS**COMPONENTS****CAS NO.****% BY WEIGHT**

SAFETY DATA SHEET

Fludioxonil Technical

Fludioxonil
Proprietary process related impurities

131341-86-1
Trade Secret

95.06 - 100
Trade Secret

Synonyms: 4-(2,2-difluoro-1,3-benzodioxol-4-yl)-1H-pyrrole-3-carbonitrile

Ingredients not precisely identified are proprietary or non-hazardous. Values are not product specifications

4. FIRST AID MEASURES

If on Skin or Clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

If Swallowed: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

If in Eyes: Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

If Inhaled: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Most Important symptoms/effects: Dermal irritation, Respiratory irritation

Indication of Immediate medical attention and special treatment if needed: For ingestion there is no specific antidote available. Treat symptomatically.

5. FIRE FIGHTING MEASURES

Extinguishing Media: Recommended for large fires: alcohol-resistant foam, dry chemical, water spray, or carbon dioxide. Recommended for small fires: dry chemical or carbon dioxide.

Special Fire Fighting Procedures: Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full fire-fighting turn out gear. Toxic, irritating vapors may be formed if product is involved in a fire. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.

Unusual Fire and Explosion Hazards: Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source, is a potential dust explosion hazard. If water is used to fight fire, contain runoff, using dikes to prevent contamination of water supplies. Dispose of fire control water later.

Hazardous Decomposition Materials (Under Fire Conditions): May produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Environmental Precautions: Prevent material from entering public sewer systems or any waterways. Do not flush to drain. Large spills to soil or similar surfaces may necessitate removal of topsoil. The affected area should be removed and placed in an appropriate container for disposal.

Methods for Containment: Dike spill using absorbent or impervious materials such as earth, sand or clay. Collect and contain contaminated absorbent and dike material for disposal.

Methods for Cleanup and Disposal: Avoid creation of dusty conditions. If dry, sweep or scoop up material and place into container for disposal. If wet, pump any free liquid into an appropriate closed container. Decontaminate tools and equipment following cleanup. See Section 13: DISPOSAL CONSIDERATIONS for more information.

Other Information: Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.

Avoid dispersal of dust in the air (i.e., clearing dust surfaces with compressed air).

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE

HANDLING:

Minimize dust generation and accumulation. Routine housekeeping should be instituted to ensure that dusts do not accumulate on surfaces. Dry powders can build static electricity charges when subjected to the friction of transfer and mixing operations. Provide adequate precautions, such as electrical grounding and bonding, or inert atmospheres.

Avoid contact with eyes, skin or clothing. Avoid breathing dust. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/Personal Protective Equipment (PPE) immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove Personal Protective Equipment (PPE) immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

STORAGE:

Always use original container to store pesticides in a cool, dry secured warehouse or storage building. Do not store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use. Do not contaminate water, food or feed by storage or disposal.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls:

Where engineering controls are indicated by specific use conditions or a potential for excessive exposure, use local exhaust ventilation at the point of generation.

Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).

Personal Protective Equipment:

Eye/Face Protection: To avoid contact with eyes, wear chemical goggles or shielded safety glasses. An emergency eyewash or water supply should be readily accessible to the work area.

Skin Protection: To avoid contact with skin wear long-sleeved shirt and long pants, shoes, socks, and chemical resistant gloves. An emergency shower or water supply should be readily accessible to the work area.

Respiratory Protection: Not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides.

General Hygiene Considerations: Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material: 1) do not store, use and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored; 2) wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics or using the toilet.

Exposure Guidelines:

Component	OSHA		ACGIH		Unit
	TWA	STEL	TWA	STEL	
Fludioxonil	NE	NE	NE	NE	
Proprietary process impurities	N/A	N/A	N/A	N/A	

NE = Not Established

N/A= Not Applicable

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Green-beige to faintly yellow solid powder
Odor:	Odorless
Odor threshold:	No data available
pH:	6-8
Melting point/freezing point:	199.8 – 200.1° C
Initial boiling point and boiling range	No data available
Flash point:	Not applicable
Evaporation rate:	Not applicable
Flammability (solid, gas):	No data available
Upper/lower flammability or explosive limits:	No data available

SAFETY DATA SHEET

Fludioxonil Technical

Vapor pressure:	3.9 x 10 ⁻⁴ mPa (25° C)
Vapor density:	No data available
Relative density:	1.49 @ 20° C
Solubility(ies):	1.39 mg/ml
Partition coefficient: n-octanol/water:	2.95
Autoignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Note: Physical data are typical values, but may vary from sample to sample. A typical value should not be construed as a guaranteed analysis or as a specification.

10. STABILITY AND REACTIVITY

Reactivity: Not reactive

Chemical Stability: This material is stable under normal handling and storage conditions.

Possibility of Hazardous Reactions: Will not occur.

Conditions to Avoid: Keep away from heat, sparks and open flame. Minimize dust generate and accumulation.

Incompatible Materials: Strong oxidizing agents: bases and acids.

Hazardous Decomposition Products: Under fire conditions may produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Dermal contact, Inhalation

Symptoms of Exposure: Dermal irritation, Respiratory inhalation

Delayed, immediate and chronic effects of exposure: Dermal irritation, Respiratory inhalation

Toxicological Data:

Data from laboratory studies conducted on Fludioxonil Technical:

Oral: Rat LD₅₀: >5,000 mg/kg

Dermal: Rabbit LD₅₀: >2,000 mg/kg

Inhalation: Rat 4-hr LC₅₀: > 2.6 mg/L

Eye Irritation: Rabbit: Slightly irritating

Skin Irritation: Rabbit: Non irritating

Skin Sensitization: Not a contact sensitizer in guinea pigs following repeated skin exposure.

Subchronic (Target Organ) Effects: Repeated overexposure to fludioxonil may cause effects in the kidney and liver.

Carcinogenicity / Chronic Health Effects: Fludioxonil did not cause cancer in laboratory animals. EPA has classified fludioxonil as a Group D chemical – not classifiable as to human carcinogenicity.

Reproductive Toxicity: In animal studies, Fludioxonil has been shown not to interfere with reproduction.

Developmental Toxicity: Fludioxonil did not cause birth defects in animals.

Genotoxicity: In vitro bacterial assays and animal tests with fludioxonil did not demonstrate mutagenic effects.

Assessment Carcinogenicity: None listed with ACGIH, IARC, NTP or OSHA.

12. ECOLOGICAL INFORMATION

Environmental Hazards:

This product is toxic to fish and aquatic invertebrates.

Ecotoxicity:

Data on Fludioxonil Technical:

Bluegill 96-hour LC ₅₀ :	0.74 ppm	Bobwhite Quail Oral LD ₅₀ :	>5,200 ppm
Rainbow Trout 96-hour LC ₅₀ :	0.47 ppm	Mallard Duck 8-day Dietary LC ₅₀ :	>5,200 ppm
Daphnia 48-hour EC ₅₀ :	0.90 ppm	Honey Bee Oral LD ₅₀ :	> 25 µg/bee

Environmental Fate:

Fludioxonil, does not bioaccumulate, however it is persistent in soil and is stable in water. It has low mobility in soil. The material sinks in water (after 24 hours).

13. DISPOSAL CONSIDERATIONS**Waste Disposal Method:**

Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Handling and Disposal:

Bags: Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Fiber drums: Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

Plastic Drums: Nonrefillable Container. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling, if available, or puncture and dispose of in an approved sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Triple rinse containers with capacities equal to or less than 5 gallons or 50 lbs as follows: Empty the remaining contents in application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Triple rinse containers with capacities greater than 5 gallons or 50 lbs as follows: Empty the remaining contents into manufacturing equipment. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Empty the rinsate into manufacturing equipment, or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into manufacturing equipment and drain for 10 seconds after the flow begins to drip. Hold container upside down over manufacturing equipment, or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

14. TRANSPORTATION INFORMATION

Follow the precautions indicated in Section 7: HANDLING AND STORAGE of this SDS.

DOT**< 882 pounds per completed package:**

Not regulated by DOT unless shipped by water. See IMO / IMDG description.

≥ 882 pounds per completed package:

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IMO / IMDG

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IATA

Not regulated

15. REGULATORY INFORMATION**EPA FIFRA INFORMATION**

This chemical is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

SAFETY DATA SHEET

Fludioxonil Technical

CAUTION. Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

U.S. FEDERAL REGULATIONS

TSCA Inventory: This product is exempted from TSCA because it is solely for FIFRA regulated use.

SARA Hazard Notification/Reporting:

Hazard Categories Under Criteria of SARA Title III Rules (40 CFR Part 370):

Not listed

Section 313 Toxic Chemical(s):

None

Reportable Quantity (RQ) under U.S. CERCLA:

None

RCRA Waste Code:

Under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste.

State Information:

Other state regulations may apply. Check individual state requirements.

California Proposition 65: Not Listed.

16. OTHER INFORMATION

National Fire Protection Association (NFPA) Hazard Rating:

Rating for this product: Health: 1 Flammability: 1 Reactivity: 0

Hazards Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

This Safety Data Sheet (SDS) serves different purposes than and DOES NOT REPLACE OR MODIFY THE EPA-ACCEPTED PRODUCT LABELING (attached to and accompanying the product container). This SDS provides important health, safety and environmental information for employers, employees, emergency responders and others handling large quantities of the product in activities generally other than product use, while the labeling provides that information specifically for product use in the ordinary course.

Use, storage and disposal of pesticide products are regulated by the EPA under the authority of the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) through the product labeling, and all necessary and appropriate precautionary, use, storage, and disposal information is set forth on that labeling. It is a violation of Federal law to use a pesticide product in any manner not prescribed on the EPA-accepted label.

Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, Nufarm Americas Inc. makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving same will make their own determination as to its suitability for their purposes prior to use. In no event will Nufarm Americas Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon Information. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

Date of Issue: May 29, 2015

Supersedes: February 9, 2015



United States
ENVIRONMENTAL PROTECTION AGENCY

OMB Control No. 2070-0020
Expires on 11/30/2016

Washington, DC 20460

Notice of Arrival of Pesticides and Devices

Send Completed Form to Appropriate Regional Office Listed in the Instructions for this Form.

Note: Read Instructions before completing form.

Part 1: To Be Completed by Importer of record or Licensed Customs Broker

1. Name and Complete Address of Licenced Customs Broker			2. Name and Complete Address of Importer of Record		
Expeditors International Attn: Brynn Wisz 849 Thomas Drive Bensenville, IL 60106 T:630-616-2318			Nufarm Americas Inc. 11901 South Austin Avenue Alsip, IL 60803 T: 708-377-1330		
<input checked="" type="checkbox"/> Return Form to this Address			<input type="checkbox"/> Return to this Address		
3. Name and Complete Address of Shipper			4. EPA Registration Number	5. EPA Producer Establishment No.	
VISION FLUOROCHEM (NANJING) LTD. 150 PUQIAO ROAD, NANJING CHEMICAL INDUSTRY PARK NANJING , CHN			35935-92	90414-CHN-001	
			6. Brand Name of Product		
			Fludioxonil Technical		
7. Active Ingredients and Percentage of Each					
Fludioxonil 99.0%					
8. Unit Size	9. Quantity	10. Total Net Weight	11. Country of Origin		
25 Kg Cartons	40	1,000 Kg	China		
12. Port of Entry			13. Name and Complete Address of Carrier		
Chicago Illinois			e-WAY LOGISTICS(CHINA) CO., LTD. ON BOARD: PO212 AIR WAYBILL NUMBER 403-38714104		
14. Entry Number	15. Anticipated Entry Date				
231-2402652-2	December 3, 2015				
17. Location of Goods for Examination after Importation			16. I assert that information constituting Confidential Business Information is shown in the above blocks numbered: (Note: Blocks 4, 5, 6 and 7 are not entitled to CBI treatment--see instructions.)		
Nufarm Americas, Inc. 11901 S Austin Ave Alsip, IL 60803 Phone: 708-377-1388					
18. [Optional] For pesticides without an EPA Registration No., select all that apply: (The following information may expedite the processing of the Notice of Arrival.)					
<input type="checkbox"/> 18a. A pesticide transferred between registered establishments operated by the same producer. Domestic Producer Establishment Number: _____					
<input type="checkbox"/> 18b. A pesticide transferred between registered establishments not operated by the same producer. Domestic Producer Establishment Number: _____ EPA Registration Number of Product being Formulated, if applicable: _____					
<input type="checkbox"/> 18c. A pesticide distributed under an Experimental Use Permit. Experimental Use Permit Number: _____					

EPA Registration Number: 35935-92	Product Name: Fludioxonil Technical
Total Net Weight: 1,000 Kg	Entry Number: 231-2402652-2

- ☐ 18d. A Pesticide distributed for research and development purposes without an Experimental Use Permit.
- ☐ 18e. A pesticide transferred solely for export. Domestic Producer Establishment Number: _____
- ☐ 18f. A pesticide distributed under an emergency exemption. Emergency Exemption Number: _____
- ☐ 18g. A pesticide transferred for the purposes of disposal.
- ☐ 18h. Other. Provide an explanation including the intended use and a description of why the product is being imported into the United States in Block 19 -- Remarks.

19. Remarks. Provide additional information here. It is recommended that a copy of the label affixed to the product be submitted with the NOA.

AIR WAYBILL NUMBER 403-38714104

Certification

I certify that the statements I made on this form and all attachments thereto are true, accurate and complete. I acknowledge that any knowingly false or misleading statement may be punishable by fine or imprisonment or both under applicable law.

20. Printed Name of Importer of Record or Licensed Customs Broker: Vic Sweetwood Telephone No.: 708-377-1365

21. Signature of Importer of Record or Licensed Customs Broker:  Date: December 3, 2015


Part II: To Be Completed by U.S. Environmental Protection Agency

Action to be taken by U.S. Customs and Border Protection:

☐ Release Shipment ☒ Retain for inspection ☐ Release shipment to consignee under bond. Shipment must be held intact pending inspection.

☐ Other. (Specify) ENFORCEMENT HOLD - EPA INSPECTION

Remarks: A CR 12.13 - THIS IMPORT SHIPMENT SHOULD BE MOVED TO A CENTRAL EXAMINATION SITE FOR INSPECTION. PLEASE CALL EPA AT 312-876-7598 OR 312-853-8931 WHEN SHIPMENT IS AVAILABLE

Signature and Title of EPA Official:  Date: 12/7/15

Part III: To Be Completed by U.S. Customs and Border Protection

The information shown in Part I was compared with the entry papers for this shipment and no discrepancies were noted. The shipment was handled as instructed by EPA in Part II. Any deviations should be brought to the attention of EPA before releasing the shipment and should be noted in "Remarks."

Remarks:

Signature of District Director of Customs: _____ Date: _____

Paperwork Reduction Act Notice: The estimated average time to read the instructions and complete this form is 26 minutes. Send comments regarding the burden estimates or any other aspect of this collection of information to: Director, Collection Strategies Division, Office of Environmental Information (OEI), U.S. Environmental Protection Agency (Mail Code 2822), 1200 Pennsylvania Avenue, NW, Washington, DC 20460. Include OMB number 2070-0020 in any correspondence.

FLUDIOXONIL TECHNICAL

For Manufacturing Use Only

ACTIVE INGREDIENT:

Fludioxonil..... 99.0%

OTHER INGREDIENTS: 1.0%

TOTAL: 100.0%

EPA REG. NO. 35935-92

EPA EST. NO. 90414-CHN-1

KEEP OUT OF REACH OF CHILDREN

CAUTION

SEE BELOW FOR FIRST AID AND ADDITIONAL PRECAUTIONARY STATEMENTS

For Chemical Spill, Leak, Fire, or Exposure, Call CHEMTREC (800) 424-9300
For Medical Emergencies Only, Call (877) 325-1840

PRECAUTIONARY STATEMENTS

HAZARDS TO HUMANS AND DOMESTIC ANIMALS

CAUTION

Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

FIRST AID

IF IN EYES	<ul style="list-style-type: none">Hold eye open and rinse slowly and gently with water for 15 to 20 minutes.Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye.Call a poison control center or doctor for treatment advice.
IF ON SKIN OR CLOTHING	<ul style="list-style-type: none">Take off contaminated clothing.Rinse skin immediately with plenty of water for 15 to 20 minutes.Call a poison control center or doctor for treatment advice.
IF INHALED	<ul style="list-style-type: none">Move person to fresh air.If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible.Call a poison control center or doctor for further treatment advice.
IF SWALLOWED	<ul style="list-style-type: none">Call a poison control center or doctor immediately for treatment advice.Have person sip a glass of water if able to swallow.Do not induce vomiting unless told to do so by the poison control center or doctor.Do not give anything by mouth to an unconscious person.

HOT LINE NUMBER

Have the product container or label with you when calling a poison control center or doctor, or going for treatment. You may also contact 1-877-325-1840 for emergency medical treatment information.

ENVIRONMENTAL HAZARDS

This product is toxic to fish and aquatic invertebrates. Do not discharge effluent containing this product into lakes, streams, ponds, estuaries, oceans, or other waters unless in accordance with the requirements of a National Pollutant Discharge Elimination System (NPDES) permit and the permitting authority has been notified in writing prior to discharge. Do not discharge effluent containing this product to sewer systems without previously notifying the local sewage treatment plant authority. For guidance contact your State Water Board or Regional Office of the EPA.

DIRECTIONS FOR USE

It is a violation of Federal law to use this product in a manner inconsistent with its labeling.

This product is intended for the formulation of fungicide products. This product may be used to formulate products for specific use(s) not listed on the MP label if the formulator, user group, or grower has complied with the U.S. EPA data submission requirements regarding the support of such use(s).

FOR MANUFACTURING USE ONLY INTO A FUNGICIDE FOR THE FOLLOWING USES:

- Seed Treatment Uses:** Root and Tuber vegetables, Bulb vegetables, Leafy vegetables, except Brassica vegetables, Brassica (Cole) leafy vegetables, Legume vegetables (succulent or dried), Fruiting vegetables (except cucurbits), Cucurbit vegetables, Cereal grains, Nongrass animal feeds (forage, fodder, straw, and hay), Herbs and Spices, Rape, Cotton, Peanut, Crambe, Flax, Jojoba, Lesquerella, Safflower, and Sunflower.
- Post Harvest Uses:** Citrus fruit group (Crop group 10), Kiwi, Pome fruit group (Crop group 11), Pomegranate, Stone fruit group (Crop group 12), and Sweet potato.
- Uses for which the US EPA has accepted the required data and/or citations of data that the formulator has submitted in support of registration; and
- Uses for experimental purposes that are in compliance with US EPA requirements

STORAGE AND DISPOSAL

DO NOT contaminate water, food, or feed by storage or disposal.

PESTICIDE STORAGE: Always use original container to store pesticides in a cool, dry secured warehouse or storage building. DO NOT store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use.

PESTICIDE DISPOSAL: Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

CONTAINER DISPOSAL:

Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

WARRANTY DISCLAIMER AND LIMITATION OF LIABILITY

The directions for use of this product must be followed carefully. TO THE EXTENT CONSISTENT WITH APPLICABLE LAW, (1) THE GOODS DELIVERED TO YOU ARE FURNISHED "AS IS" BY MANUFACTURER OR SELLER AND (2) MANUFACTURER AND SELLER MAKE NO WARRANTIES, GUARANTEES, OR REPRESENTATIONS OF ANY KIND TO BUYER OR USER, EITHER EXPRESS OR IMPLIED, OR BY USAGE OF TRADE, STATUTORY OR OTHERWISE, WITH REGARD TO THE PRODUCT SOLD, INCLUDING, BUT NOT LIMITED TO MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE, USE, OR ELIGIBILITY OF THE PRODUCT FOR ANY PARTICULAR TRADE USAGE TO THE EXTENT CONSISTENT WITH APPLICABLE LAW. BUYER'S OR USER'S EXCLUSIVE REMEDY, AND MANUFACTURER'S OR SELLER'S TOTAL LIABILITY SHALL BE FOR DAMAGES NOT EXCEEDING THE COST OF THE PRODUCT.

If you do not agree with or do not accept any of directions for use, the warranty disclaimers, or limitations on liability, do not use the product, and return it unopened to the Seller, and the purchase price will be refunded.

(RV030714)

17103000

NET WEIGHT: 55 LBS (25 KG)

Manufactured For
NUFARM LTD.
4020 Aerial Center Parkway
Morrisville, NC 27560



SAFETY DATA SHEET

Fludioxonil Technical



1. CHEMICAL PRODUCT AND COMPANY IDENTIFICATION

Product Name: Fludioxonil Technical
EPA Reg. No.: 35935-92
Product Type: Fungicide - For Manufacturing Use Only
Company Name: Nufarm Limited.
4020 Aerial Center Parkway
Morrisville, NC 27560
1-800-345-3330

Telephone Numbers: For Chemical Emergency, Spill, Leak, Fire, Exposure, or Accident,
Call CHEMTREC Day or Night: 1-800-424-9300
For Medical Emergencies Only, Call 1-877-325-1840

This product is an EPA FIFRA registered pesticide. Some classifications on this SDS are not the same as on the FIFRA label. Certain sections are superseded by federal law governed by EPA for a registered pesticide. Please see Section 15. REGULATORY INFORMATION for explanation.

2. HAZARDS IDENTIFICATION

HEALTH HAZARDS:

Acute toxicity, inhalation	Category 4
Specific target organ toxicity – Repeated exposure	Category 2

ENVIRONMENTAL HAZARDS:

Hazardous to aquatic environment, acute	Category 1
Hazardous to aquatic environment, chronic	Category 1

SIGNAL WORD:

WARNING

HAZARD STATEMENTS:

Harmful if inhaled. May cause damage to organs (liver, kidney) through prolonged or repeated exposure. Very toxic to aquatic life with long lasting effects.



PRECAUTIONARY STATEMENTS

Do not breathe dust, fumes, gas, mist, vapors or spray. Use only outdoors or in a well-ventilated area. Call a poison control center or doctor if you feel unwell. If exposed or concerned: Call a poison center/doctor. See Section 4 First Aid and label instructions for emergency medical advice. Get medical advice/attention if you feel unwell.

Do not eat, drink, or smoke when using this product.

Respiratory protection not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides. Get medical advice/attention if you feel unwell.

Dispose of contents/container in accordance with state and federal regulations. See Section 13 and product label for disposal instructions.

3. COMPOSITION / INFORMATION ON INGREDIENTS

COMPONENTS

CAS NO.

% BY WEIGHT

SAFETY DATA SHEET

Fludioxonil Technical

Fludioxonil
Proprietary process related impurities

131341-86-1
Trade Secret

95.06 - 100
Trade Secret

Synonyms: 4-(2,2-difluoro-1,3-benzodioxol-4-yl)-1H-pyrrole-3-carbonitrile

Ingredients not precisely identified are proprietary or non-hazardous. Values are not product specifications

4. FIRST AID MEASURES

If on Skin or Clothing: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15 to 20 minutes. Call a poison control center or doctor for treatment advice.

If Swallowed: Call a poison control center or doctor immediately for treatment advice. Have person sip a glass of water if able to swallow. Do not induce vomiting unless told to do so by the poison control center or doctor. Do not give anything by mouth to an unconscious person.

If in Eyes: Hold eye open and rinse slowly and gently with water for 15 to 20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.

If Inhaled: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a poison control center or doctor for further treatment advice.

Most Important symptoms/effects: Dermal irritation, Respiratory irritation

Indication of immediate medical attention and special treatment if needed: For ingestion there is no specific antidote available. Treat symptomatically.

5. FIRE FIGHTING MEASURES

Extinguishing Media: Recommended for large fires: alcohol-resistant foam, dry chemical, water spray, or carbon dioxide. Recommended for small fires: dry chemical or carbon dioxide.

Special Fire Fighting Procedures: Firefighters should wear NIOSH/MSHA approved self-contained breathing apparatus and full fire-fighting turn out gear. Toxic, irritating vapors may be formed if product is involved in a fire. Dike area to prevent runoff and contamination of water sources. Dispose of fire control water later.

Unusual Fire and Explosion Hazards: Avoid generating dust; fine dust dispersed in air in sufficient concentrations, and in the presence of an ignition source, is a potential dust explosion hazard. If water is used to fight fire, contain runoff, using dikes to prevent contamination of water supplies. Dispose of fire control water later.

Hazardous Decomposition Materials (Under Fire Conditions): May produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Wear appropriate protective gear for the situation. See Personal Protection information in Section 8.

Environmental Precautions: Prevent material from entering public sewer systems or any waterways. Do not flush to drain. Large spills to soil or similar surfaces may necessitate removal of topsoil. The affected area should be removed and placed in an appropriate container for disposal.

Methods for Containment: Dike spill using absorbent or impervious materials such as earth, sand or clay. Collect and contain contaminated absorbent and dike material for disposal.

Methods for Cleanup and Disposal: Avoid creation of dusty conditions. If dry, sweep or scoop up material and place into container for disposal. If wet, pump any free liquid into an appropriate closed container. Decontaminate tools and equipment following cleanup. See Section 13: DISPOSAL CONSIDERATIONS for more information.

Other Information: Dust deposits should not be allowed to accumulate on surfaces, as these may form an explosive mixture if they are released into the atmosphere in sufficient concentration.

Avoid dispersal of dust in the air (i.e., clearing dust surfaces with compressed air).

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE**HANDLING:**

Minimize dust generation and accumulation. Routine housekeeping should be instituted to ensure that dusts do not accumulate on surfaces. Dry powders can build static electricity charges when subjected to the friction of transfer and mixing operations. Provide adequate precautions, such as electrical grounding and bonding, or inert atmospheres.

Avoid contact with eyes, skin or clothing. Avoid breathing dust. Users should wash hands before eating, drinking, chewing gum, using tobacco or using the toilet. Remove clothing/Personal Protective Equipment (PPE) immediately if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove Personal Protective Equipment (PPE) immediately after handling this product. Wash the outside of gloves before removing. As soon as possible, wash thoroughly and change into clean clothing.

STORAGE:

Always use original container to store pesticides in a cool, dry secured warehouse or storage building. Do not store near food and feed. Containers should be opened in well-ventilated areas. Keep container tightly sealed when not in use. Do not contaminate water, food or feed by storage or disposal.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION**Engineering Controls:**

Where engineering controls are indicated by specific use conditions or a potential for excessive exposure, use local exhaust ventilation at the point of generation.

Ensure that dust-handling systems (such as exhaust ducts, dust collectors, vessels, and processing equipment) are designed in a manner to prevent the escape of dust into the work area (i.e., there is no leakage from the equipment).

Personal Protective Equipment:

Eye/Face Protection: To avoid contact with eyes, wear chemical goggles or shielded safety glasses. An emergency eyewash or water supply should be readily accessible to the work area.

Skin Protection: To avoid contact with skin wear long-sleeved shirt and long pants, shoes, socks, and chemical resistant gloves. An emergency shower or water supply should be readily accessible to the work area.

Respiratory Protection: Not normally required. If dusts exceed acceptable levels, wear NIOSH approved air-purifying respirator with cartridges/canisters approved for use against pesticides.

General Hygiene Considerations: Personal hygiene is an important work practice exposure control measure and the following general measures should be taken when working with or handling this material: 1) do not store, use and/or consume foods, beverages, tobacco products, or cosmetics in areas where this material is stored; 2) wash hands and face carefully before eating, drinking, using tobacco, applying cosmetics or using the toilet.

Exposure Guidelines:

Component	OSHA		ACGIH		Unit
	TWA	STEL	TWA	STEL	
Fludioxonil	NE	NE	NE	NE	
Proprietary process impurities	N/A	N/A	N/A	N/A	

NE = Not Established

N/A= Not Applicable

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance:	Green-beige to faintly yellow solid powder
Odor:	Odorless
Odor threshold:	No data available
pH:	6-8
Melting point/freezing point:	199.8 – 200.1° C
Initial boiling point and boiling range	No data available
Flash point:	Not applicable
Evaporation rate:	Not applicable
Flammability (solid, gas):	No data available
Upper/lower flammability or explosive limits:	No data available

SAFETY DATA SHEET

Fludioxonil Technical

Vapor pressure:	3.9 x 10 ⁻⁴ mPa (25° C)
Vapor density:	No data available
Relative density:	1.49 @ 20° C
Solubility(ies):	1.39 mg/ml
Partition coefficient: n-octanol/water:	2.95
Autoignition temperature:	No data available
Decomposition temperature:	No data available
Viscosity:	No data available

Note: Physical data are typical values, but may vary from sample to sample. A typical value should not be construed as a guaranteed analysis or as a specification.

10. STABILITY AND REACTIVITY

Reactivity: Not reactive

Chemical Stability: This material is stable under normal handling and storage conditions.

Possibility of Hazardous Reactions: Will not occur.

Conditions to Avoid: Keep away from heat, sparks and open flame. Minimize dust generate and accumulation.

Incompatible Materials: Strong oxidizing agents: bases and acids.

Hazardous Decomposition Products: Under fire conditions may produce gases such as hydrogen chloride, hydrogen fluoride, oxides and nitrogen.

11. TOXICOLOGICAL INFORMATION

Likely Routes of Exposure: Dermal contact, Inhalation

Symptoms of Exposure: Dermal irritation, Respiratory inhalation

Delayed, immediate and chronic effects of exposure: Dermal irritation, Respiratory inhalation

Toxicological Data:

Data from laboratory studies conducted on Fludioxonil Technical:

Oral: Rat LD₅₀: >5,000 mg/kg

Dermal: Rabbit LD₅₀: >2,000 mg/kg

Inhalation: Rat 4-hr LC₅₀: > 2.6 mg/L

Eye Irritation: Rabbit: Slightly irritating

Skin Irritation: Rabbit: Non irritating

Skin Sensitization: Not a contact sensitizer in guinea pigs following repeated skin exposure.

Subchronic (Target Organ) Effects: Repeated overexposure to fludioxonil may cause effects in the kidney and liver.

Carcinogenicity / Chronic Health Effects: Fludioxonil did not cause cancer in laboratory animals. EPA has classified fludioxonil as a Group D chemical – not classifiable as to human carcinogenicity.

Reproductive Toxicity: In animal studies, Fludioxonil has been shown not to interfere with reproduction.

Developmental Toxicity: Fludioxonil did not cause birth defects in animals.

Genotoxicity: In vitro bacterial assays and animal tests with fludioxonil did not demonstrate mutagenic effects.

Assessment Carcinogenicity: None listed with ACGIH, IARC, NTP or OSHA.

12. ECOLOGICAL INFORMATION

Environmental Hazards:

This product is toxic to fish and aquatic invertebrates.

Ecotoxicity:

Data on Fludioxonil Technical:

Bluegill 96-hour LC ₅₀ :	0.74 ppm	Bobwhite Quail Oral LD ₅₀ :	>5,200 ppm
Rainbow Trout 96-hour LC ₅₀ :	0.47 ppm	Mallard Duck 8-day Dietary LC ₅₀ :	>5,200 ppm
Daphnia 48-hour EC ₅₀ :	0.90 ppm	Honey Bee Oral LD ₅₀ :	> 25 µg/bee

Environmental Fate:

Fludioxonil, does not bioaccumulate, however it is persistent in soil and is stable in water. It has low mobility in soil. The material sinks in water (after 24 hours).

13. DISPOSAL CONSIDERATIONS**Waste Disposal Method:**

Open dumping is prohibited. Wastes resulting from the use of this product may be disposed of on site or at an approved waste disposal facility.

Container Handling and Disposal:

Bags: Nonrefillable container. Do not reuse or refill this container. Completely empty bag into manufacturing equipment. Offer for recycling if available or dispose of empty bag in a sanitary landfill or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Fiber drums: Nonrefillable container. Do not reuse or refill this container. Completely empty liner by shaking and tapping both sides and bottom to loosen clinging particles. Empty residue into manufacturing equipment. Then offer fiber drum and liner for recycling, if available.

Plastic Drums: Nonrefillable Container. Do not reuse or refill this container. Triple rinse or pressure rinse container (or equivalent) promptly after emptying. Then offer for recycling, if available, or puncture and dispose of in an approved sanitary landfill, or by incineration, or, if allowed by state and local authorities, by burning. If burned, stay out of smoke.

Triple rinse containers with capacities equal to or less than 5 gallons or 50 lbs as follows: Empty the remaining contents in application equipment or a mix tank. Fill the container 1/4 full with water and recap. Shake for 10 seconds. Pour rinsate into application equipment or a mix tank or store rinsate for later use or disposal. Drain for 10 seconds after the flow begins to drip. Repeat this procedure two more times.

Triple rinse containers with capacities greater than 5 gallons or 50 lbs as follows: Empty the remaining contents into manufacturing equipment. Fill the container 1/4 full with water. Replace and tighten closures. Tip container on its side and roll it back and forth, ensuring at least one complete revolution, for 30 seconds. Stand the container on its end and tip it back and forth several times. Empty the rinsate into manufacturing equipment, or store rinsate for later use or disposal. Repeat this procedure two more times. **Pressure rinse as follows:** Empty the remaining contents into manufacturing equipment and drain for 10 seconds after the flow begins to drip. Hold container upside down over manufacturing equipment, or collect rinsate for later use or disposal. Insert pressure rinsing nozzle in the side of the container and rinse at about 40 PSI for at least 30 seconds. Drain for 10 seconds after the flow begins to drip.

14. TRANSPORTATION INFORMATION

Follow the precautions indicated in Section 7: HANDLING AND STORAGE of this SDS.

DOT**< 882 pounds per completed package:**

Not regulated by DOT unless shipped by water. See IMO / IMDG description.

≥ 882 pounds per completed package:

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IMO / IMDG

UN3077, Environmentally hazardous substance, solid, n.o.s.,
(Fludioxonil), 9, III, Marine Pollutant

IATA

Not regulated

15. REGULATORY INFORMATION**EPA FIFRA INFORMATION**

This chemical is a pesticide product registered by the United States Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS), and for workplace labels of non-pesticide chemicals. The hazard information required on the pesticide label is reproduced below. The pesticide label also includes other important information, including directions for use.

SAFETY DATA SHEET

Fludioxonil Technical

CAUTION. Harmful if inhaled or absorbed through skin. Avoid contact with eyes, skin, or clothing. Avoid breathing vapor or spray mist. Wash thoroughly with soap and water after handling. Remove contaminated clothing and wash before reuse.

U.S. FEDERAL REGULATIONS

TSCA Inventory: This product is exempted from TSCA because it is solely for FIFRA regulated use.

SARA Hazard Notification/Reporting:

Hazard Categories Under Criteria of SARA Title III Rules (40 CFR Part 370):

Not listed

Section 313 Toxic Chemical(s):

None

Reportable Quantity (RQ) under U.S. CERCLA:

None

RCRA Waste Code:

Under RCRA, it is the responsibility of the product user to determine at the time of disposal, whether a material containing the product or derived from the product should be classified as a hazardous waste.

State Information:

Other state regulations may apply. Check individual state requirements.

California Proposition 65: Not Listed.

16. OTHER INFORMATION

National Fire Protection Association (NFPA) Hazard Rating:

Rating for this product: Health: 1 Flammability: 1 Reactivity: 0

Hazards Scale: 0 = Minimal 1 = Slight 2 = Moderate 3 = Serious 4 = Severe

This Safety Data Sheet (SDS) serves different purposes than and DOES NOT REPLACE OR MODIFY THE EPA-ACCEPTED PRODUCT LABELING (attached to and accompanying the product container). This SDS provides important health, safety and environmental information for employers, employees, emergency responders and others handling large quantities of the product in activities generally other than product use, while the labeling provides that information specifically for product use in the ordinary course.

Use, storage and disposal of pesticide products are regulated by the EPA under the authority of the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA) through the product labeling, and all necessary and appropriate precautionary, use, storage, and disposal information is set forth on that labeling. It is a violation of Federal law to use a pesticide product in any manner not prescribed on the EPA-accepted label.

Although the information and recommendations set forth herein (hereinafter "Information") are presented in good faith and believed to be correct as of the date hereof, Nufarm Americas Inc. makes no representations as to the completeness or accuracy thereof. Information is supplied upon the condition that the persons receiving same will make their own determination as to its suitability for their purposes prior to use. In no event will Nufarm Americas Inc. be responsible for damages of any nature whatsoever resulting from the use of or reliance upon Information. NO REPRESENTATIONS OR WARRANTIES, EITHER EXPRESS OR IMPLIED, OF MERCHANTABILITY, FITNESS FOR A PARTICULAR PURPOSE OR OF ANY OTHER NATURE ARE MADE HEREUNDER WITH RESPECT TO INFORMATION OR THE PRODUCT TO WHICH INFORMATION REFERS AND ALL SUCH WARRANTIES ARE HEREBY SPECIFICALLY DISCLAIMED.

Date of Issue: May 29, 2015

Supersedes: February 9, 2015

